

Figure 4 Delineated Features and Photo Orientation Map - Sheet 1

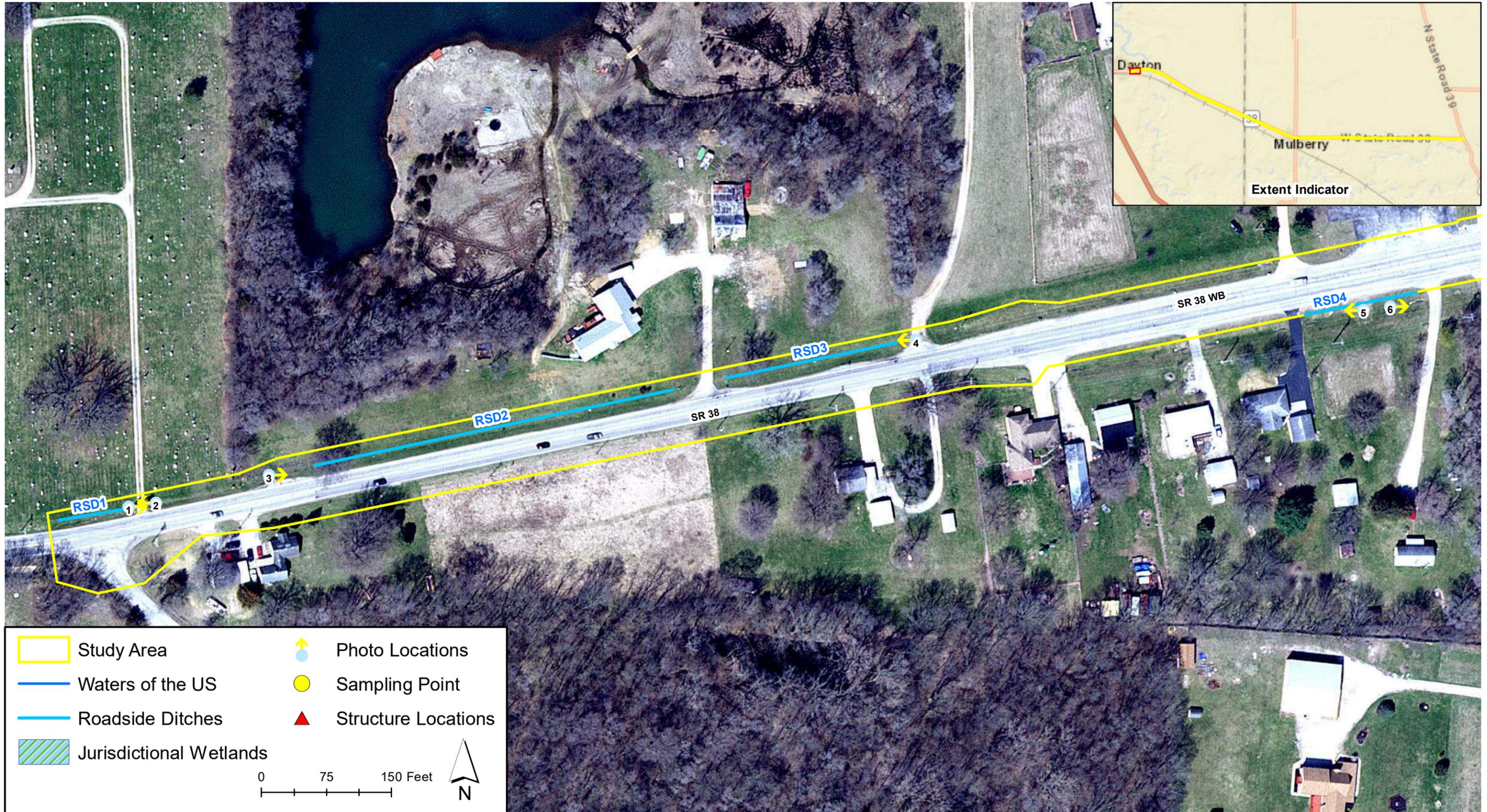


Figure 4 Delineated Features and Photo Orientation Map - Sheet 2

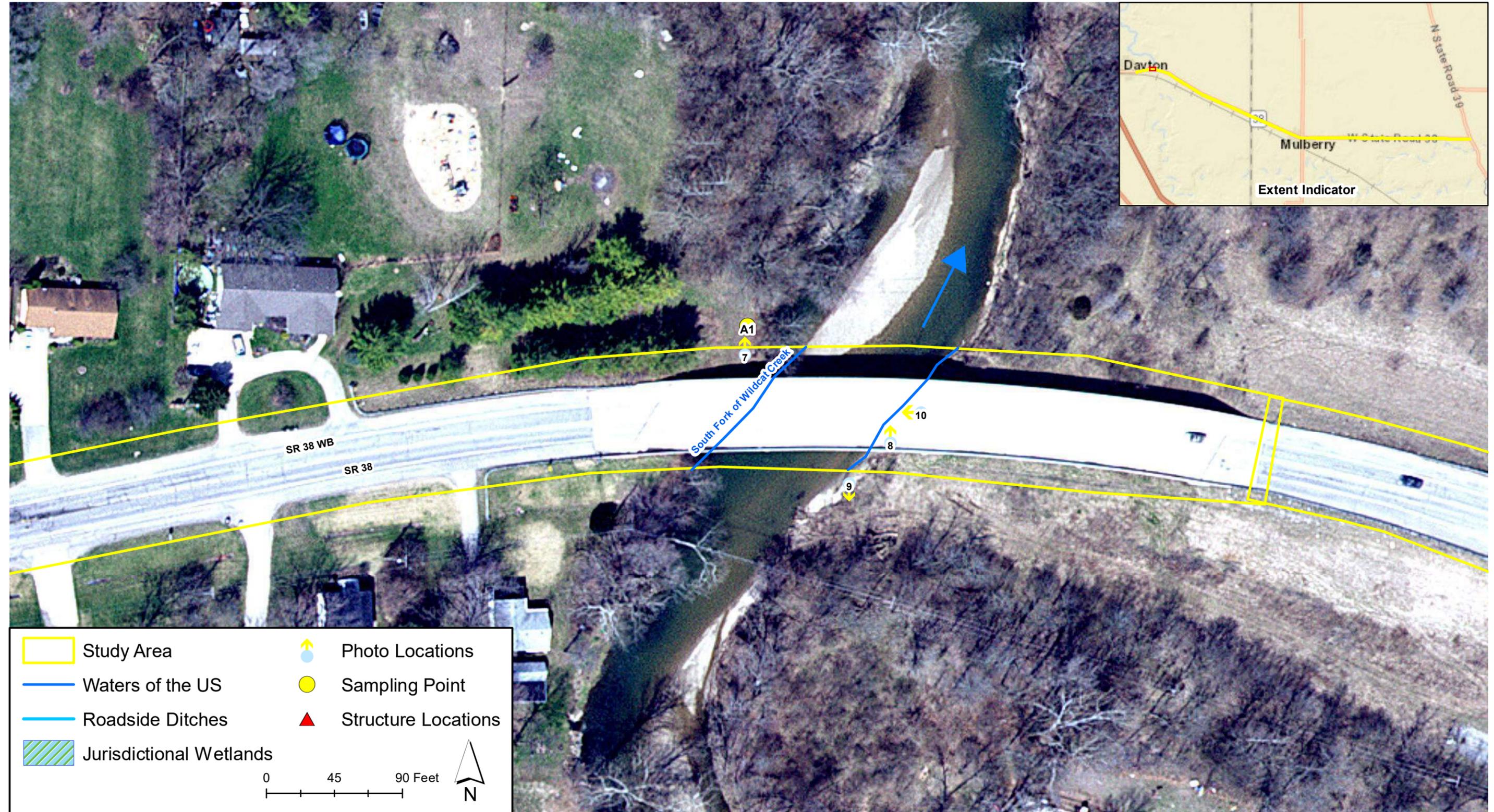


Figure 4 Delineated Features and Photo Orientation Map - Sheet 3

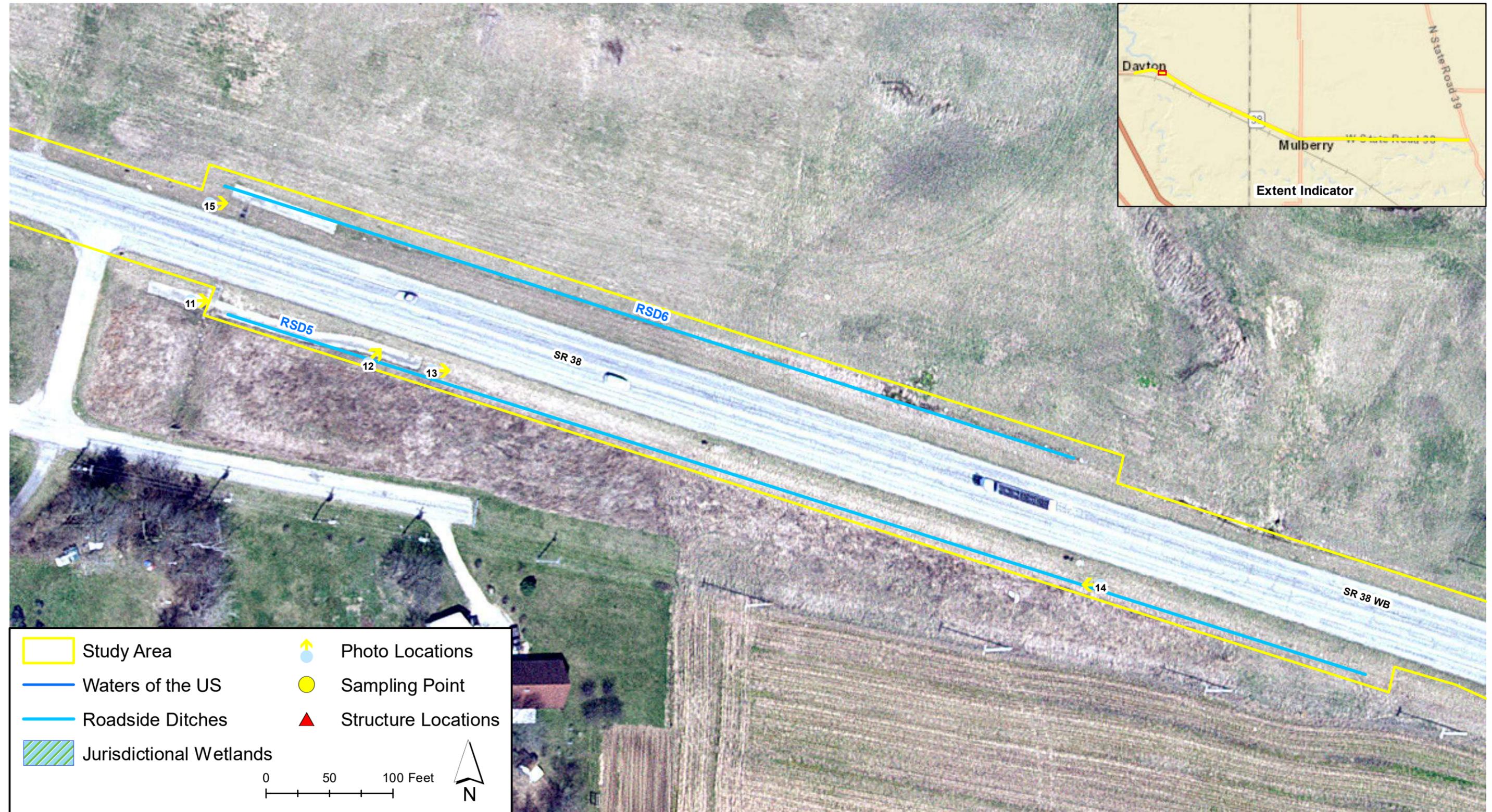


Figure 4 Delineated Features and Photo Orientation Map - Sheet 4



Figure 4 Delineated Features and Photo Orientation Map - Sheet 5



Figure 4 Delineated Features and Photo Orientation Map - Sheet 6

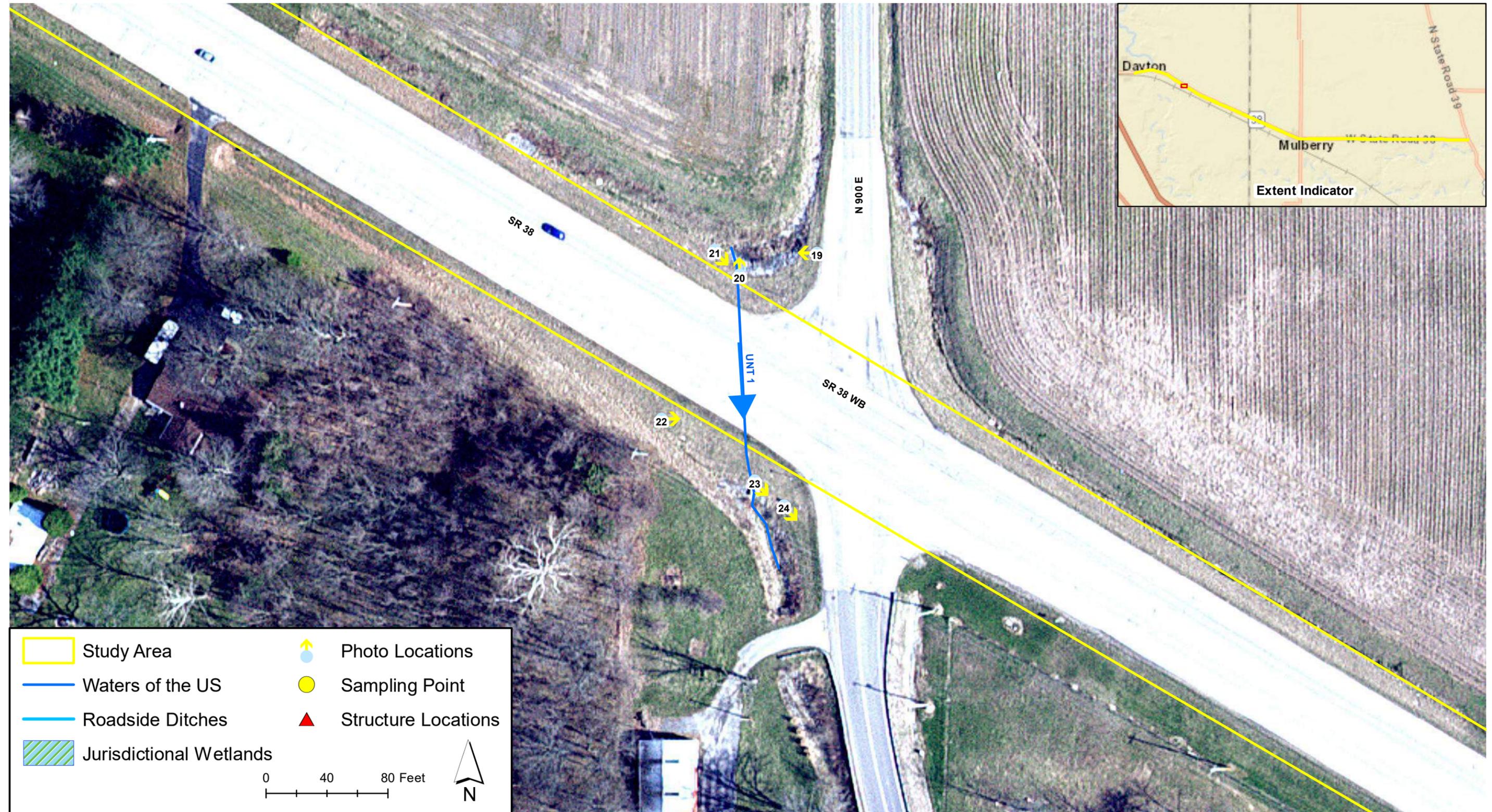


Figure 4 Delineated Features and Photo Orientation Map - Sheet 7



Figure 4 Delineated Features and Photo Orientation Map - Sheet 8



Figure 4 Delineated Features and Photo Orientation Map - Sheet 9

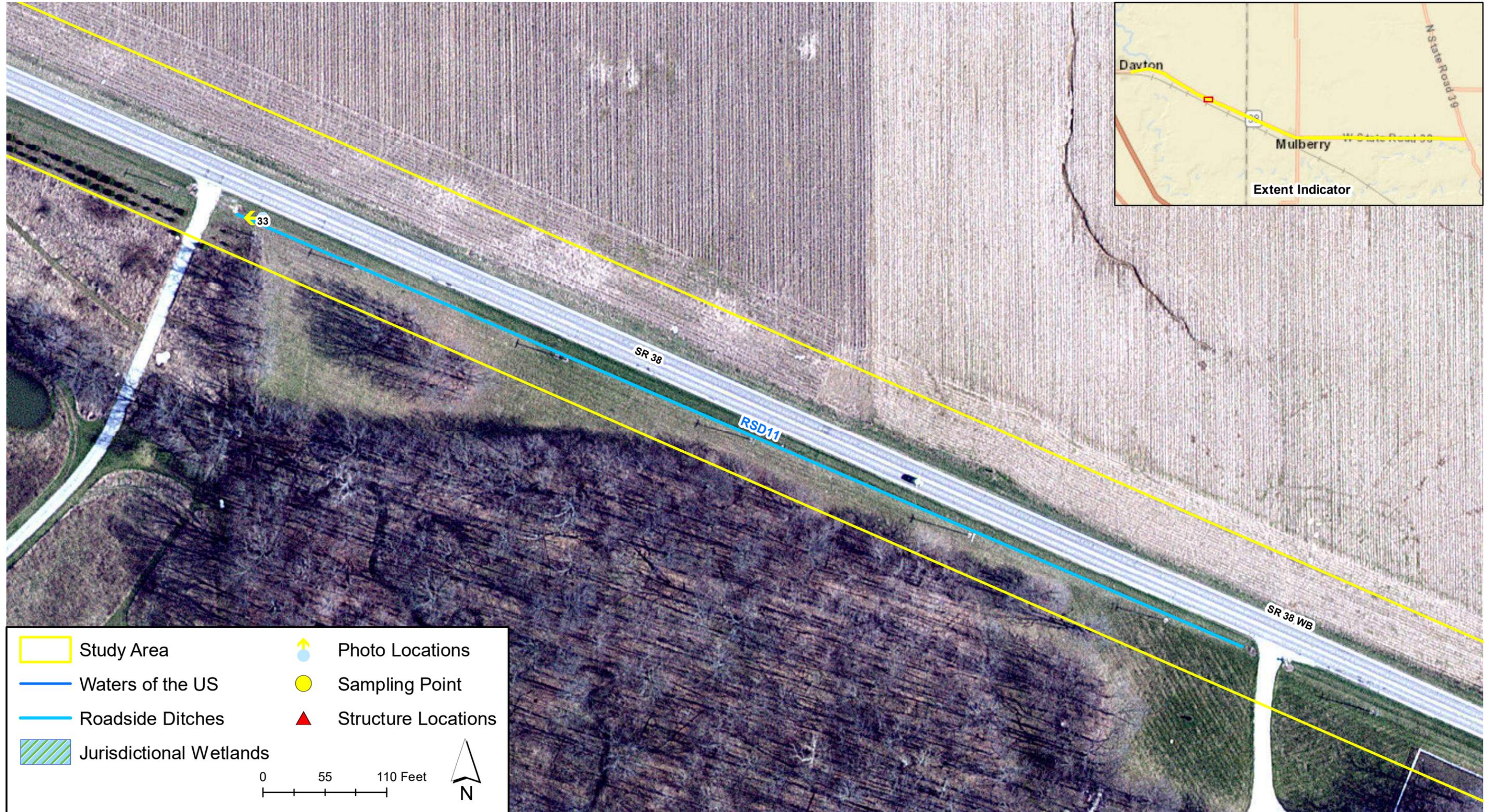


Figure 4 Delineated Features and Photo Orientation Map - Sheet 10



Figure 4 Delineated Features and Photo Orientation Map - Sheet 11

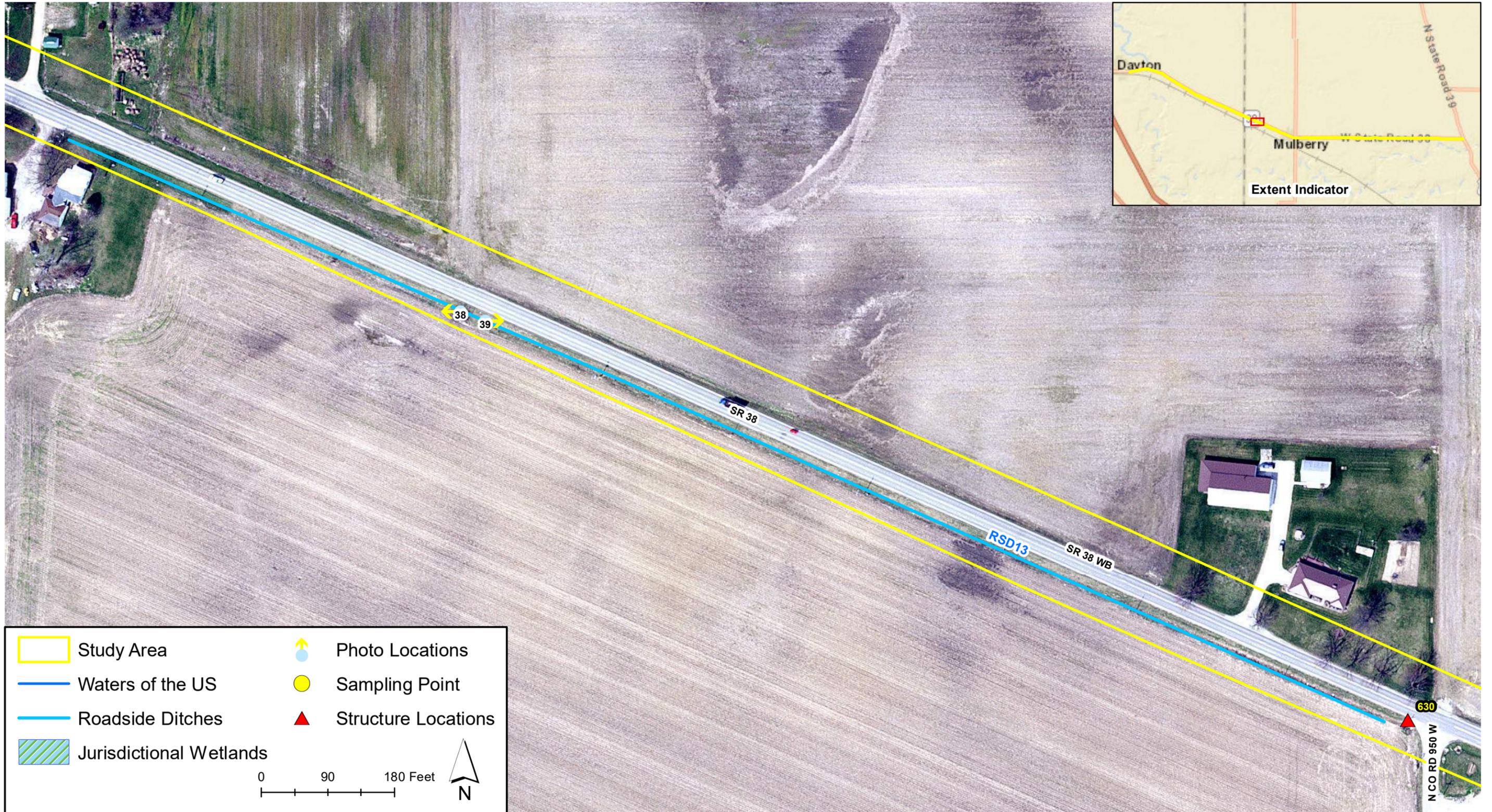


Figure 4 Delineated Features and Photo Orientation Map - Sheet 12

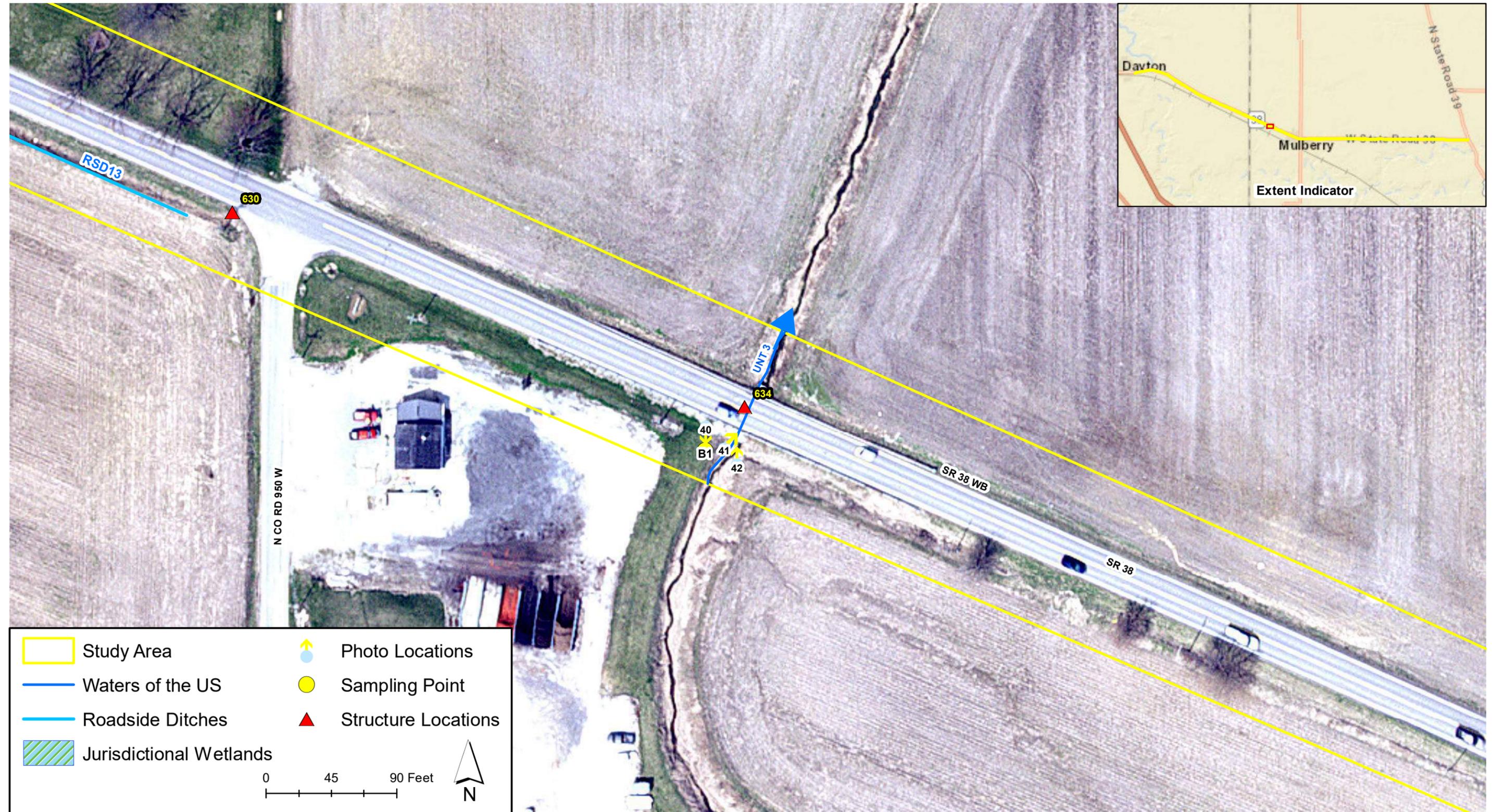


Figure 4 Delineated Features and Photo Orientation Map - Sheet 13

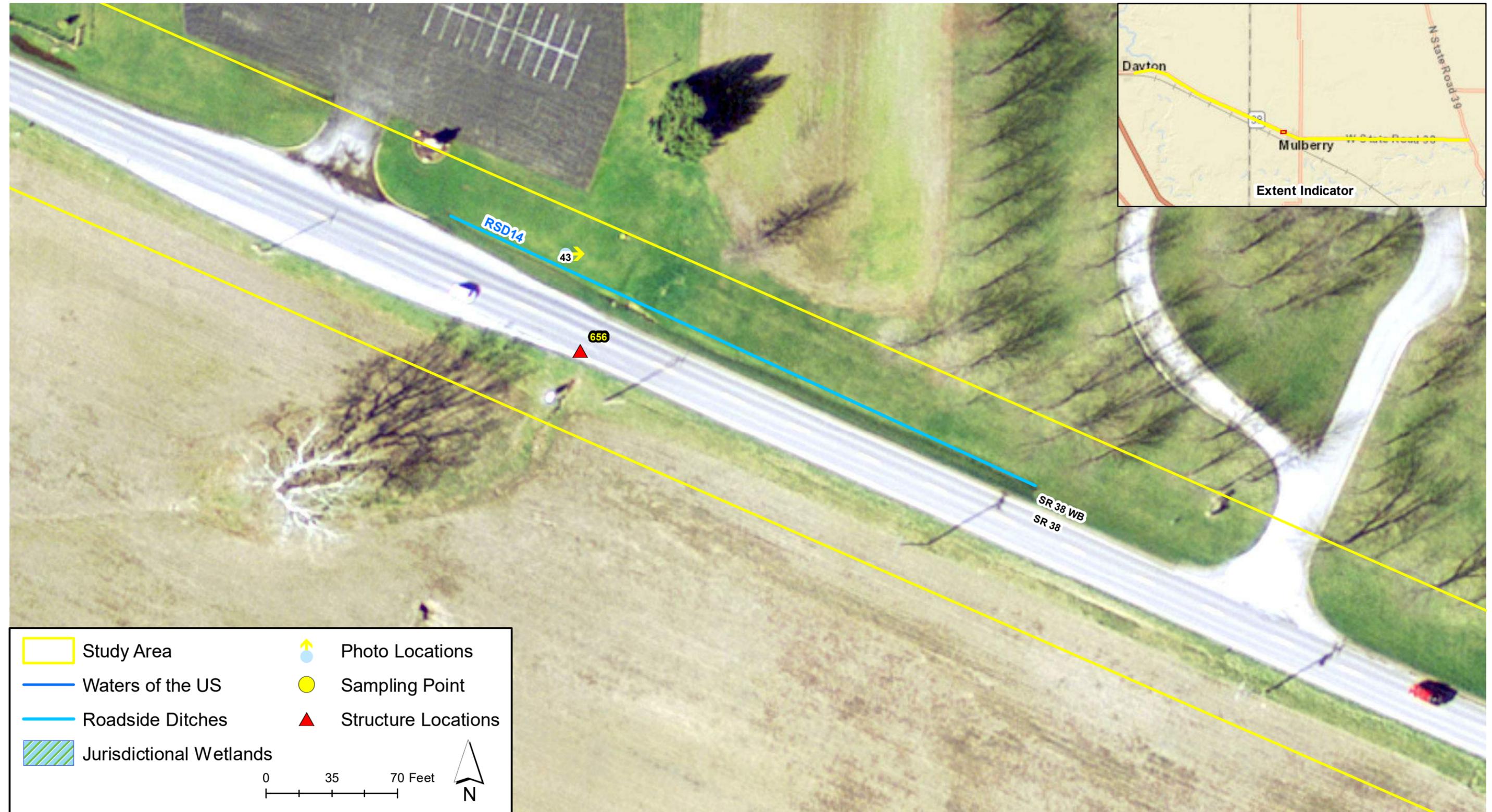
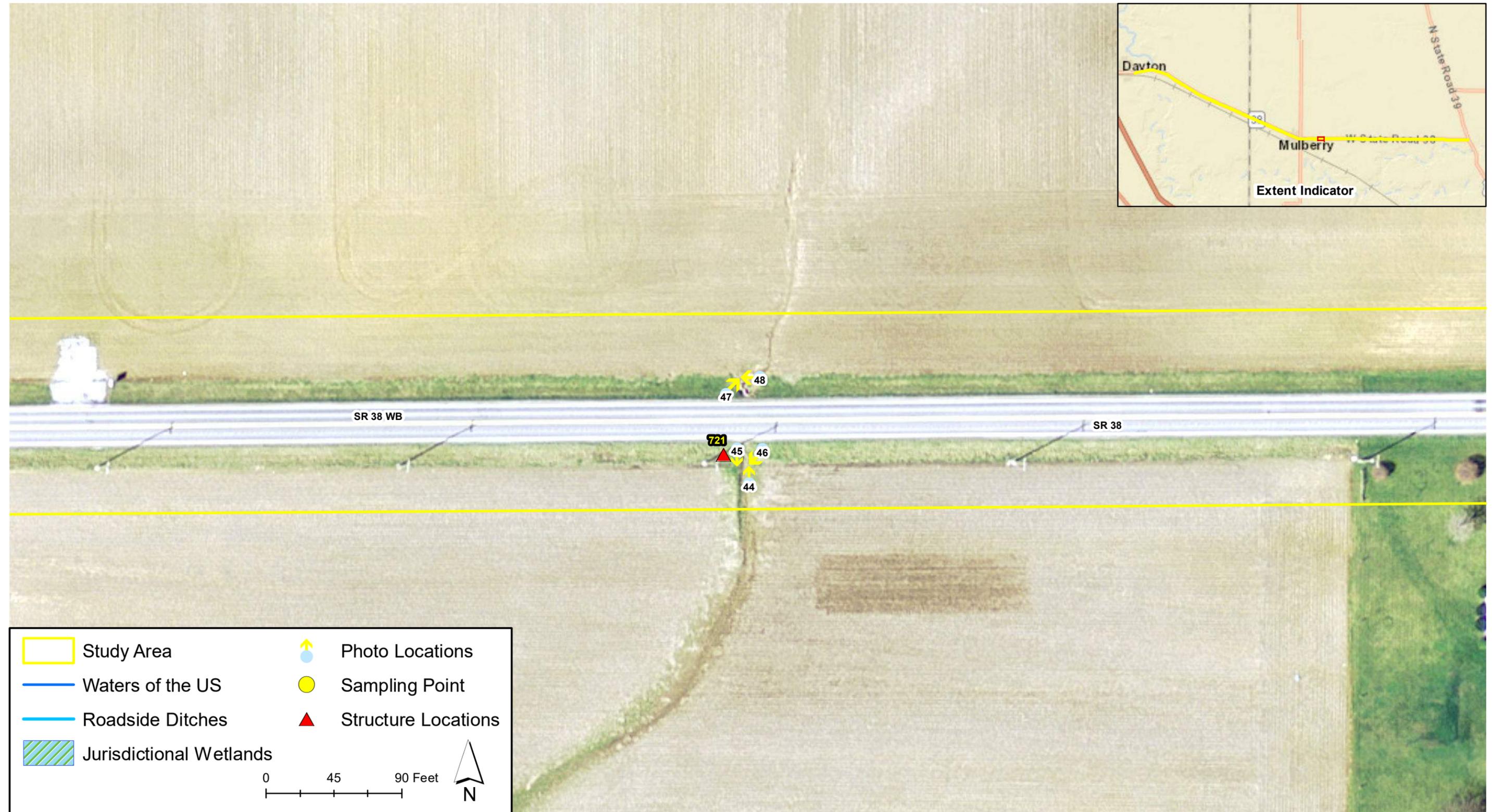


Figure 4 Delineated Features and Photo Orientation Map - Sheet 14



Study Area	Photo Locations
Waters of the US	Sampling Point
Roadside Ditches	Structure Locations
Jurisdictional Wetlands	

0 45 90 Feet

Figure 4 Delineated Features and Photo Orientation Map - Sheet 15

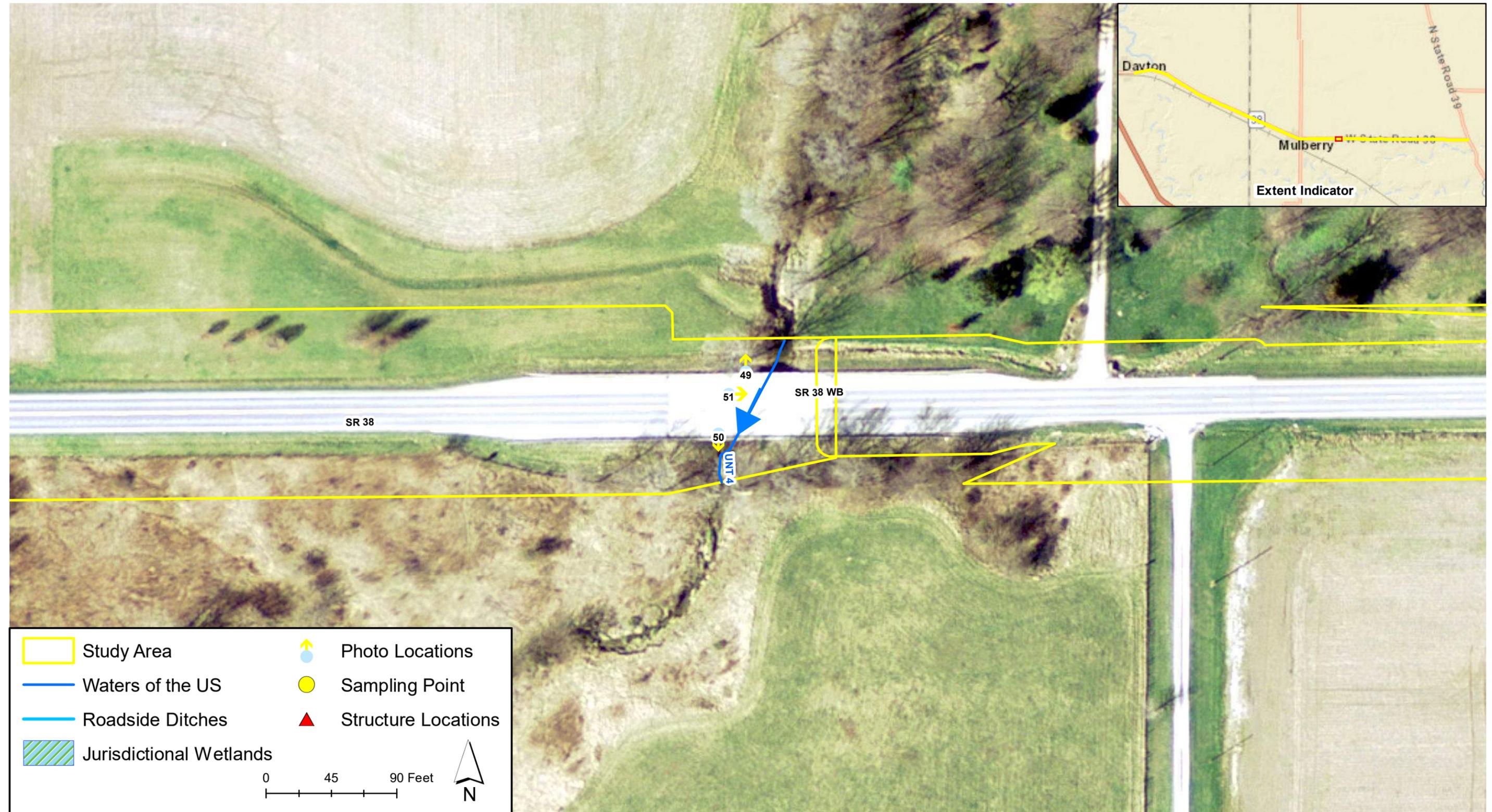
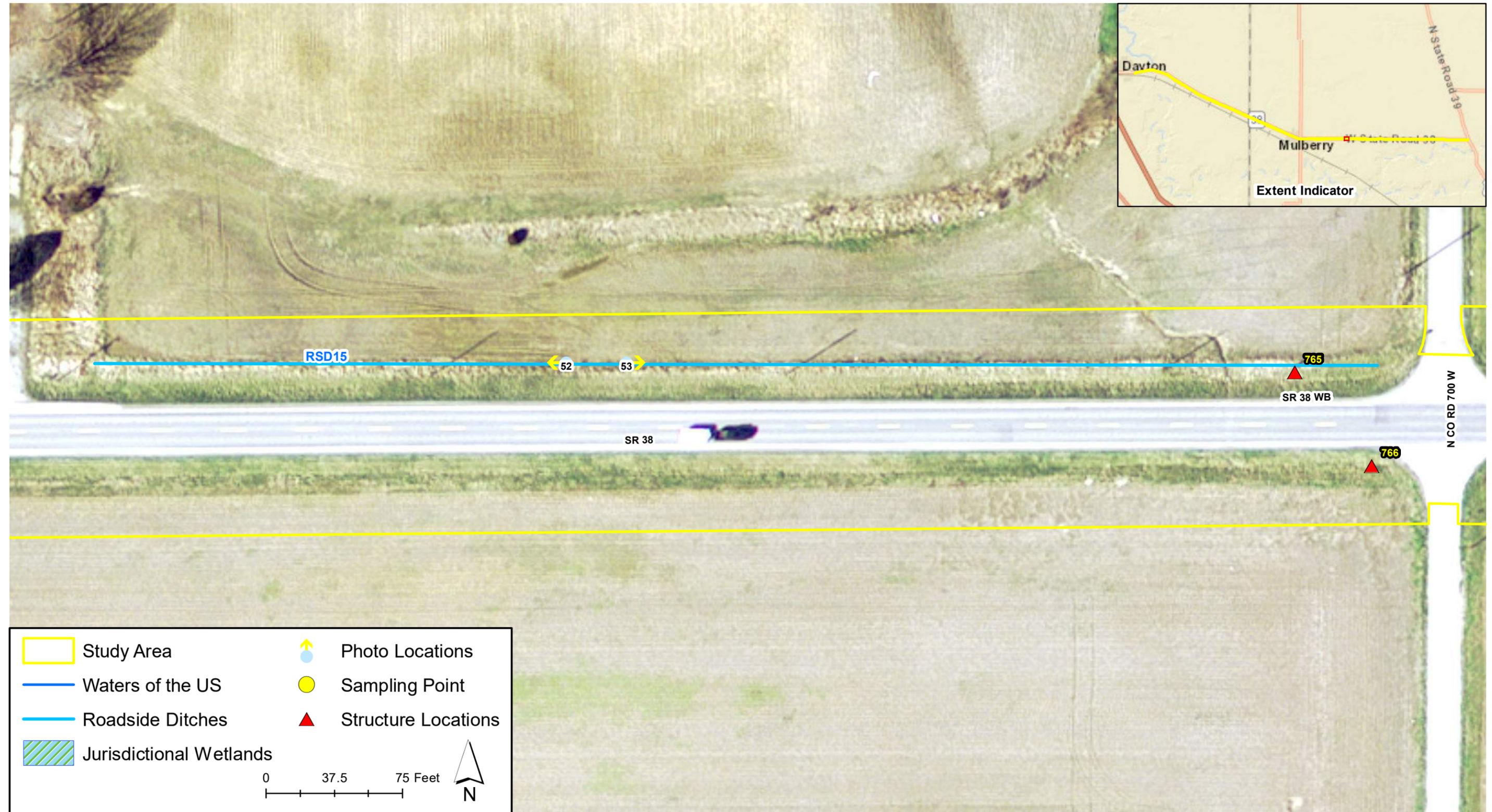


Figure 4 Delineated Features and Photo Orientation Map - Sheet 16



Study Area	Photo Locations
Waters of the US	Sampling Point
Roadside Ditches	Structure Locations
Jurisdictional Wetlands	

0 37.5 75 Feet

N

Figure 4 Delineated Features and Photo Orientation Map - Sheet 17

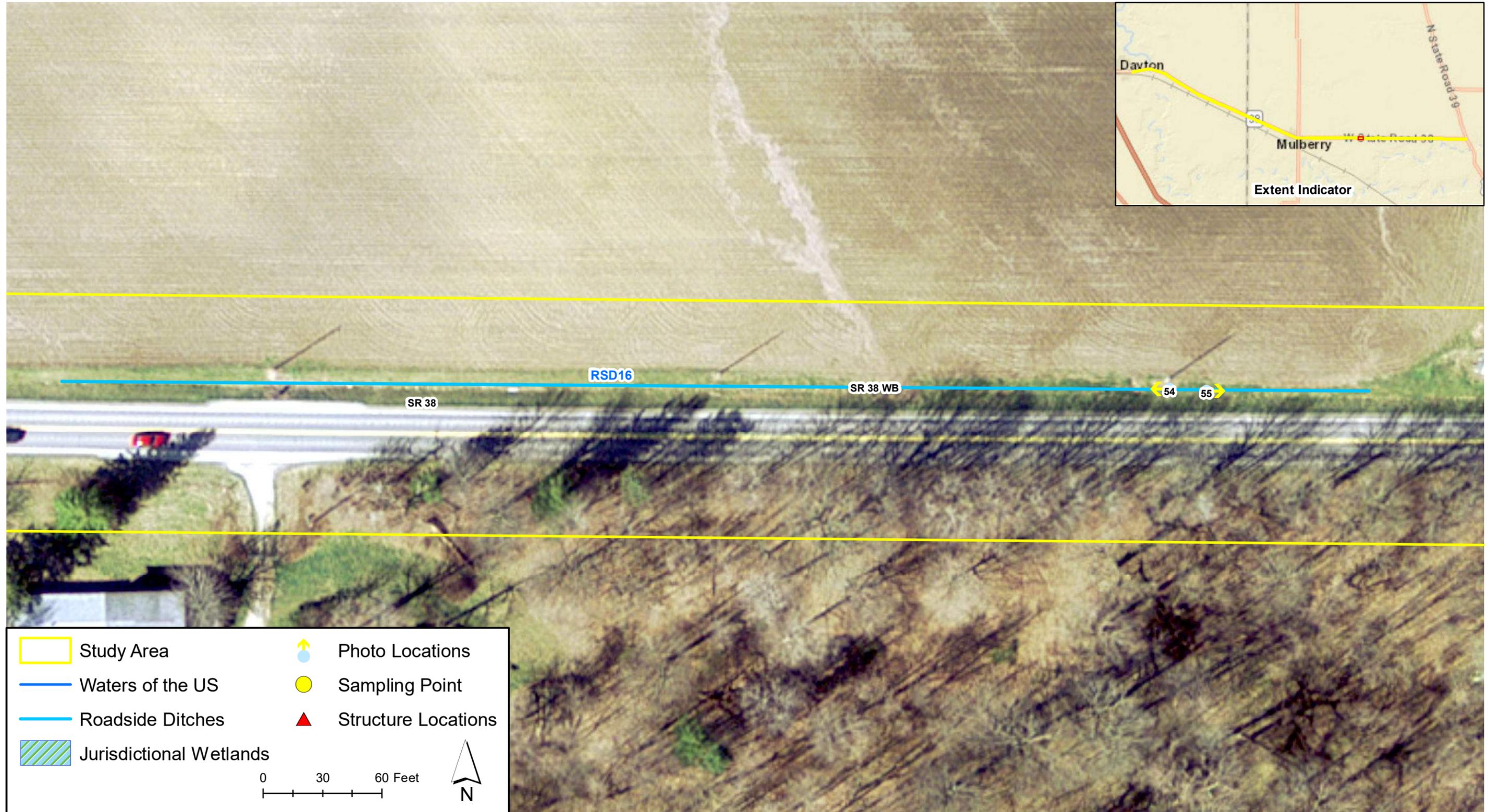
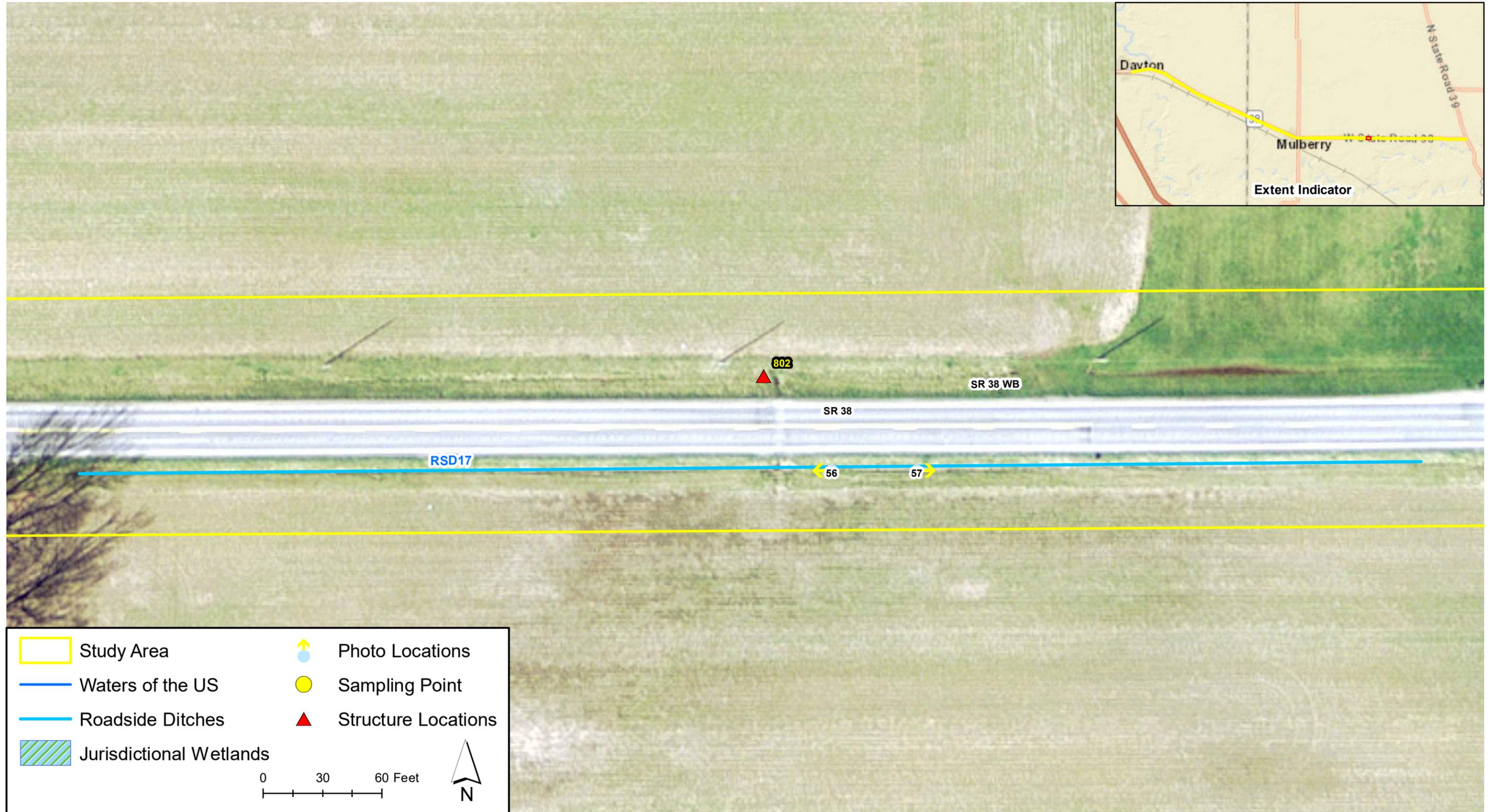


Figure 4 Delineated Features and Photo Orientation Map - Sheet 18



Study Area	Photo Locations
Waters of the US	Sampling Point
Roadside Ditches	Structure Locations
Jurisdictional Wetlands	

0 30 60 Feet

N

Figure 4 Delineated Features and Photo Orientation Map - Sheet 19

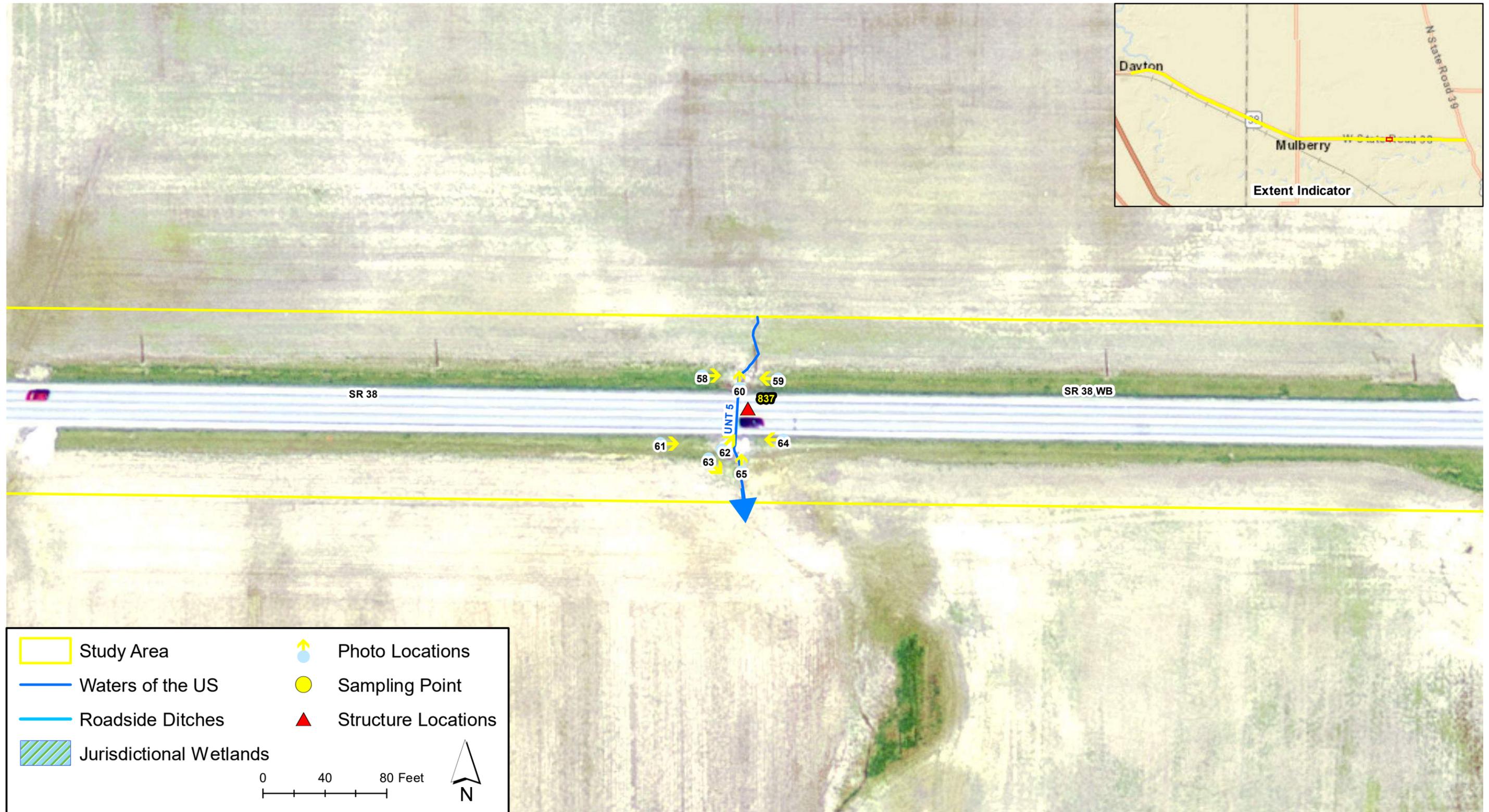


Figure 4 Delineated Features and Photo Orientation Map - Sheet 20



Figure 4 Delineated Features and Photo Orientation Map - Sheet 21

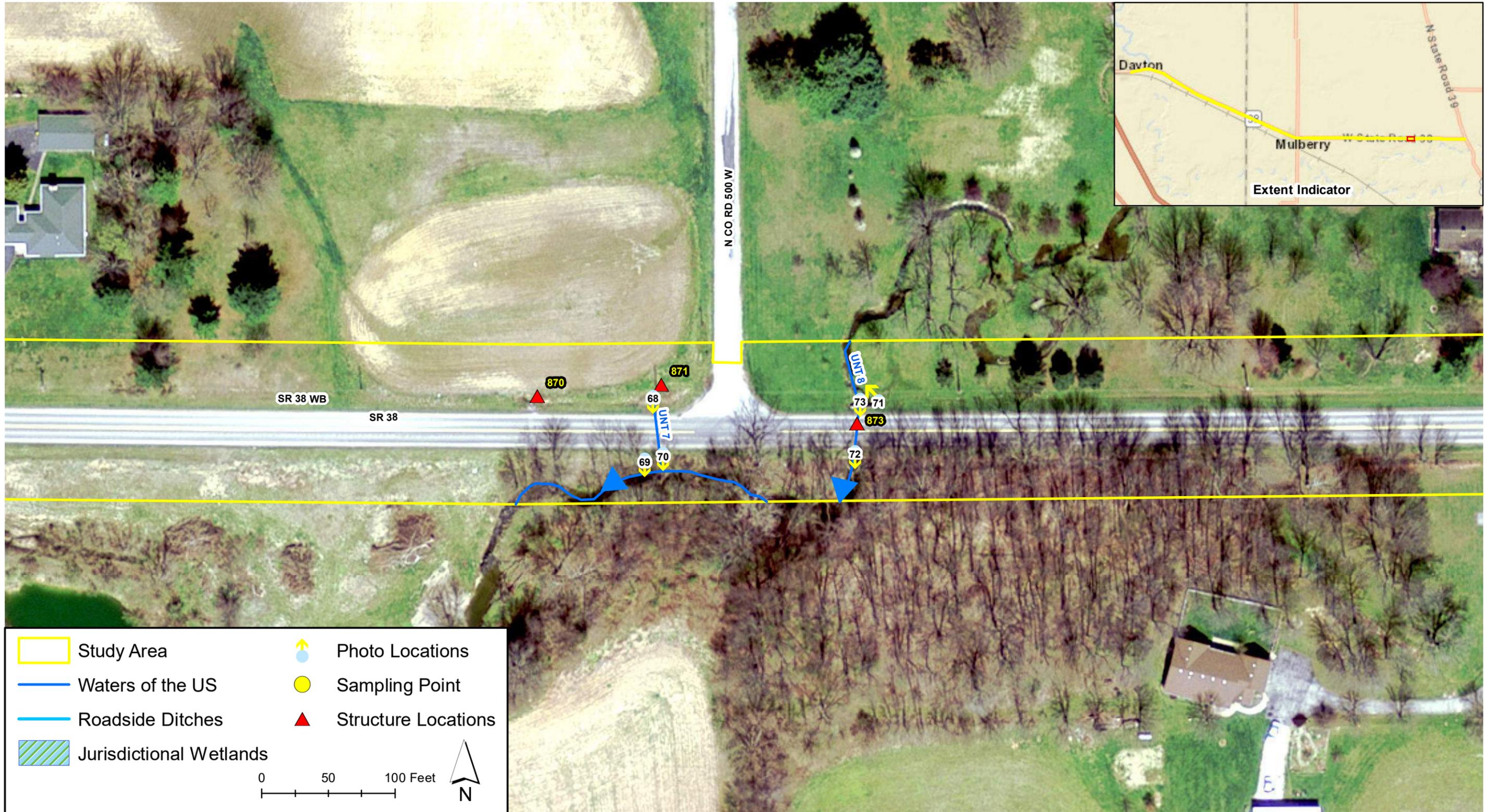


Figure 4 Delineated Features and Photo Orientation Map - Sheet 22

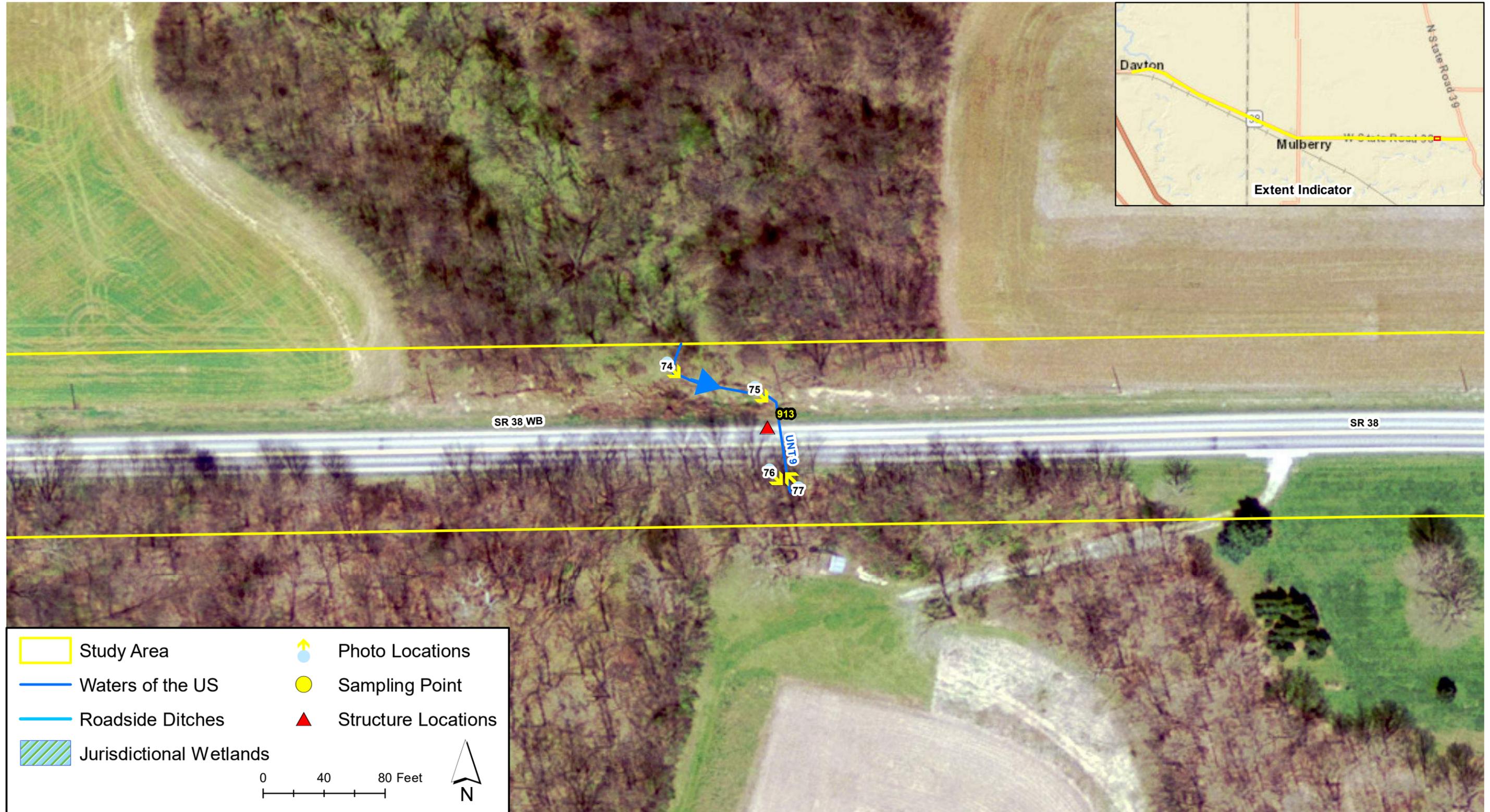


Figure 4 Delineated Features and Photo Orientation Map - Sheet 23A



Figure 4 Delineated Features and Photo Orientation Map - Sheet 23B



Study Area	Photo Locations
Waters of the US	Sampling Point
Roadside Ditches	Structure Locations
Jurisdictional Wetlands	

0 40 80 Feet

N

Figure 4 Delineated Features and Photo Orientation Map - Sheet 24

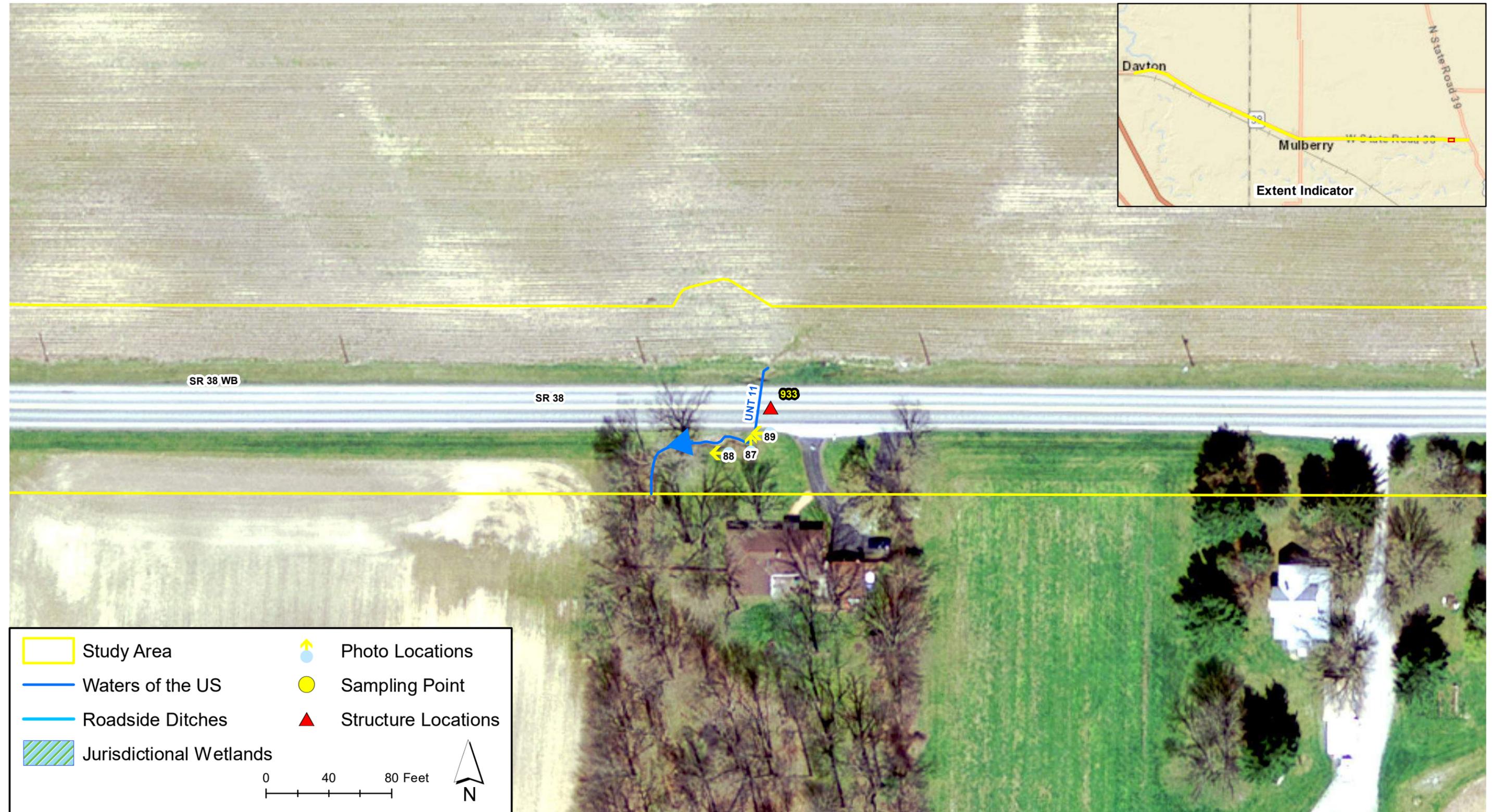


Figure 4 Delineated Features and Photo Orientation Map - Sheet 25

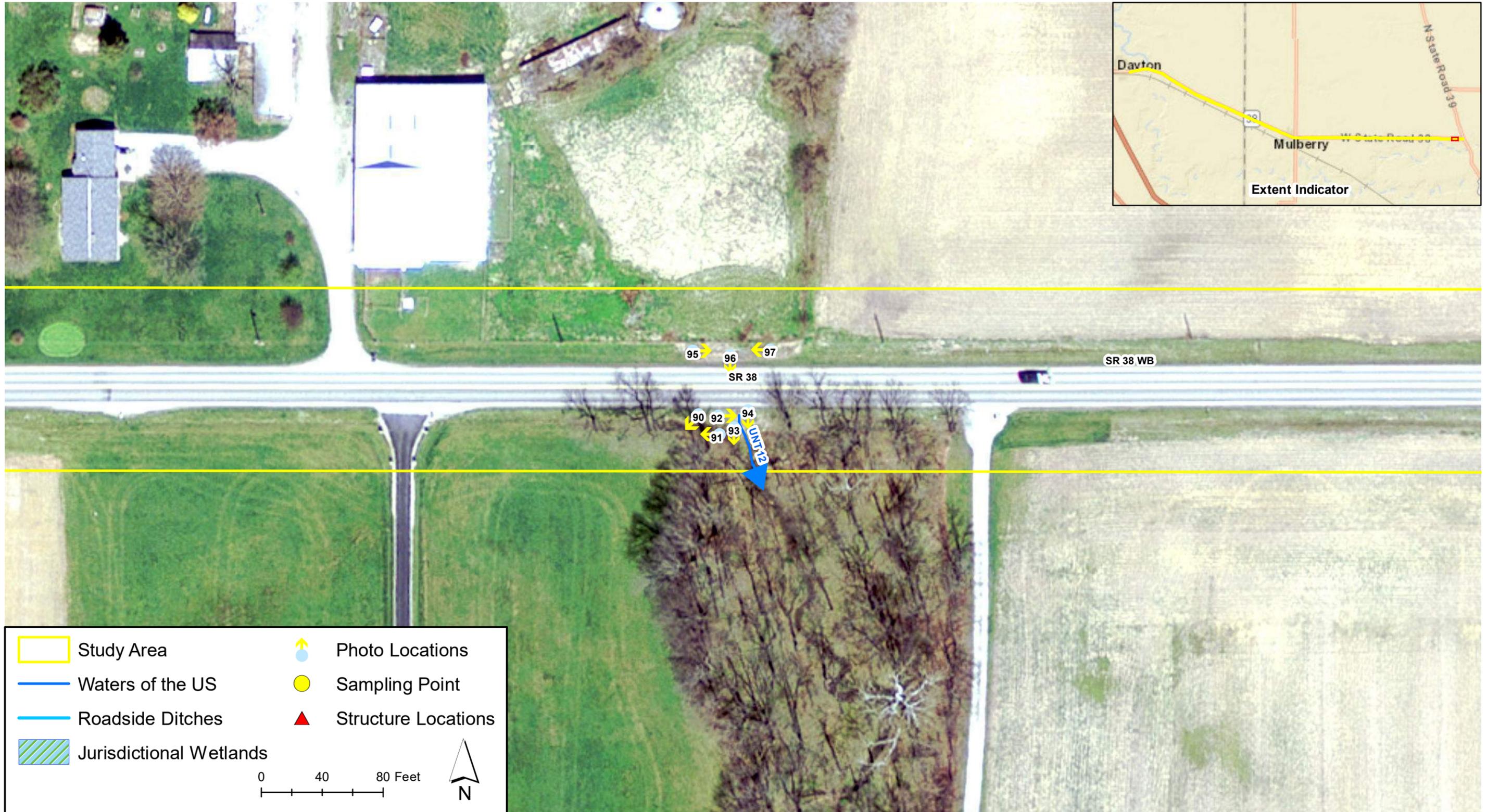


Photo 1: RSD1 along north side of SR 38, viewing east 09/01/2019 (Figure 4, Sheet 1)



Photo 2: RSD1 along north side of SR 38, viewing west 09/01/2019 (Figure 4, Sheet 1)



Photo 3: RSD2 along north side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 1)



Photo 4: RSD3 along north side of SR 38, viewing west 06/20/2019 (Figure 4, Sheet 1)



Photo 5: RSD4 along south side of SR 38, viewing west, 06/20/2019 (Figure 4, Sheet 1)



Photo 6: RSD4 along south side of SR 38, viewing east¹², 06/20/2019 (Figure 4, Sheet 1)



Photo 7: Upland Site A1 soil profile, 06/20/2019 (Figure 4, Sheet 2)



Photo 8: South Fork Wildcat Creek, viewing north, 06/18/2019 (Figure 4, Sheet 2)



Photo 9: South Fork Wildcat Creek, viewing south, 06/18/2019 (Figure 4, Sheet 2)



Photo 10: South Fork Wildcat Creek, viewing west, 06/18/2019 (Figure 4, Sheet 2)



Photo 11: RSD5 along south side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 3)



Photo 12: RSD5 along south side of SR 38, viewing northeast, 06/20/2019 (Figure 4, Sheet 3)



Photo 13: RSD5 along south side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 3)



Photo 14: RSD5 along south side of SR 38, viewing west, 06/20/2019 (Figure 4, Sheet 3)



Photo 15: RSD6 along north side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 3)



Photo 16: RSD7 along north side of SR 38, viewing northwest, 06/20/2019 (Figure 4, Sheet 4)



Photo 17: RSD8 along south side of SR 38, viewing southeast, 06/20/2019 (Figure 4, Sheet 5)



Photo 18: RSD8 along south side of SR 38, viewing northwest, 06/20/2019 (Figure 4, Sheet 5)



Photo 19: UNT 1, viewing west, 02/11/2020 (Figure 4, Sheet 6)



Photo 20: UNT 1, viewing north, 02/11/2020 (Figure 4, Sheet 6)



Photo 21: UNT 1, viewing southeast, 06/18/2019 (Figure 4, Sheet 6)



Photo 22: UNT 1, viewing east, 02/11/2020 (Figure 4, Sheet 6)



Photo 23: UNT 1, viewing southeast, 02/11/2020 (Figure 4, Sheet 6)



Photo 24: UNT 1, viewing southeast, 02/11/2020 (Figure 4, Sheet 6)



Photo 25: RSD9 along south side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 7)



Photo 26: RSD9 along south side of SR 38, viewing west, 06/20/2019 (Figure 4, Sheet 7)



Photo 27: RSD10 along south side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 8)



Photo 28: RSD10 along south side of SR 38, viewing west, 06/20/2019 (Figure 4, Sheet 8)



Photo 29: UNT 2, viewing east, 02/11/2020 (Figure 4, Sheet 8)



Photo 30: UNT 2, viewing east, 02/11/2020 (Figure 4, Sheet 8)



Photo 31: UNT 2, viewing southwest, 02/11/2020 (Figure 4, Sheet 8)



Photo 32: UNT 2, viewing west, 02/11/2020 (Figure 4, Sheet 8)



Photo 33: RSD11 along south side of SR 38, viewing west, 06/20/2019 (Figure 4, Sheet 9)



Photo 34: RSD12 along south side of SR 38, viewing west, 06/20/2019 (Figure 4, Sheet 10)



Photo 35: RSD12 along south side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 10)



Photo 36: RSD12 along south side of SR 38, viewing west, 06/20/2019 (Figure 4, Sheet 10)



Photo 37: RSD12 along south side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 10)



Photo 38: RSD13 along south side of SR 38, viewing west, 06/20/2019 (Figure 4, Sheet 11)



Photo 39: RSD13 along south side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 11)



Photo 40: Upland Site B1, viewing south, 09/01/2019 (Figure 4, Sheet 12)



Photo 41: UNT 3, viewing northeast, 06/18/2019 (Figure 4, Sheet 12)



Photo 42: UNT 3, viewing north through culvert, 06/18/2019 (Figure 4, Sheet 12)



Photo 43: RSD14 along north side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 13)



Photo 44: Structure 721, viewing north, 06/18/2019 (Figure 4, Sheet 14)



Photo 45: Structure 721, viewing south, 02/11/2020 (Figure 4, Sheet 14)



Photo 46: Structure 721, viewing southwest, 02/11/2020 (Figure 4, Sheet 14)



Photo 47: Structure 721, viewing northeast, 02/11/2020 (Figure 4, Sheet 14)



Photo 48: Structure 721, viewing west, 02/11/2020 (Figure 4, Sheet 14)



Photo 49: UNT 4, viewing north, 06/18/2019 (Figure 4, Sheet 15)



Photo 50: UNT 4, viewing south, 06/18/2019 (Figure 4, Sheet 15)



Photo 51: UNT 4, viewing east, 06/18/2019 (Figure 4, Sheet 15)



Photo 52: RSD15 along north side of SR 38, viewing west, 06/20/2019 (Figure 4, Sheet 16)



Photo 53: RSD15 along north side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 16)



Photo 54: RSD16 along north side of SR 38, viewing west, 06/20/2019 (Figure 4, Sheet 17)



Photo 55: RSD16 along north side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 17)



Photo 56: RSD17 along south side of SR 38, viewing west, 06/20/2019 (Figure 4, Sheet 18)



Photo 57: RSD17 along south side of SR 38, viewing east, 06/20/2019 (Figure 4, Sheet 18)



Photo 58: UNT 5, viewing east, 02/11/2020 (Figure 4, Sheet 19)



Photo 59: UNT 5, viewing west, 02/11/2020 (Figure 4, Sheet 19)



Photo 60: UNT 5, viewing north, 02/11/2020 (Figure 4, Sheet 19)



Photo 61: UNT 5, viewing east, 02/11/2020 (Figure 4, Sheet 19)



Photo 62: UNT 5, viewing northeast, 02/11/2020 (Figure 4, Sheet 19)



Photo 63: UNT 5, viewing southeast, 02/11/2020 (Figure 4, Sheet 19)



Photo 64: UNT 5, viewing west, 02/11/2020 (Figure 4, Sheet 19)



Photo 65: UNT 5, viewing north, 06/18/2019 (Figure 4, Sheet 19)



Photo 66: UNT 6, viewing south through culvert, 06/18/2019 (Figure 4, Sheet 20)



Photo 67: UNT 6, viewing northwest, 06/18/2019 (Figure 4, Sheet 20)



Photo 68: UNT 7, viewing south, 06/18/2019 (Figure 4, Sheet 21)



Photo 69: UNT 7, viewing south vegetation, 06/18/2019 (Figure 4, Sheet 21)



Photo 70: UNT 7, viewing south, 06/18/2019 (Figure 4, Sheet 21)



Photo 71: UNT 8, viewing northwest, 06/18/2019 (Figure 4, Sheet 21)



Photo 72: UNT 8, viewing south, 06/18/2019 (Figure 4, Sheet 21)



Photo 73: UNT 8, viewing south through culvert, 06/18/2019 (Figure 4, Sheet 21)



Photo 74: UNT 9, viewing southeast, 02/11/2020 (Figure 4, Sheet 22)



Photo 75: UNT 9, viewing southeast, 02/11/2020 (Figure 4, Sheet 22)



Photo 76: UNT 9, viewing southeast, 02/11/2020 (Figure 4, Sheet 22)



Photo 77: UNT 9, viewing northwest, 06/18/2019 (Figure 4, Sheet 22)



Photo 78: UNT 10/Wetland C, viewing east, 02/11/2020 (Figure 4, Sheet 23)



Photo 79: UNT 10, viewing south, 02/11/2020 (Figure 4, Sheet 23)



Photo 80: UNT 10/Wetland C, viewing west, 02/11/2020 (Figure 4, Sheet 23)



Photo 81: UNT 10/Wetland C, viewing west, 02/11/2020 (Figure 4, Sheet 23)



Photo 82: UNT 10/Wetland C, viewing northeast, 06/20/2019 (Figure 4, Sheet 23)



Photo 83: UNT 10/Wetland C, viewing north, 06/20/2019 (Figure 4, Sheet 23)



Photo 84: UNT 10, viewing southeast, 02/11/2020 (Figure 4, Sheet 23)



Photo 85: UNT 10, viewing south, 02/11/2020 (Figure 4, Sheet 23)



Photo 86: Upland Site C2, viewing south, 09/01/2019 (Figure 4, Sheet 23)

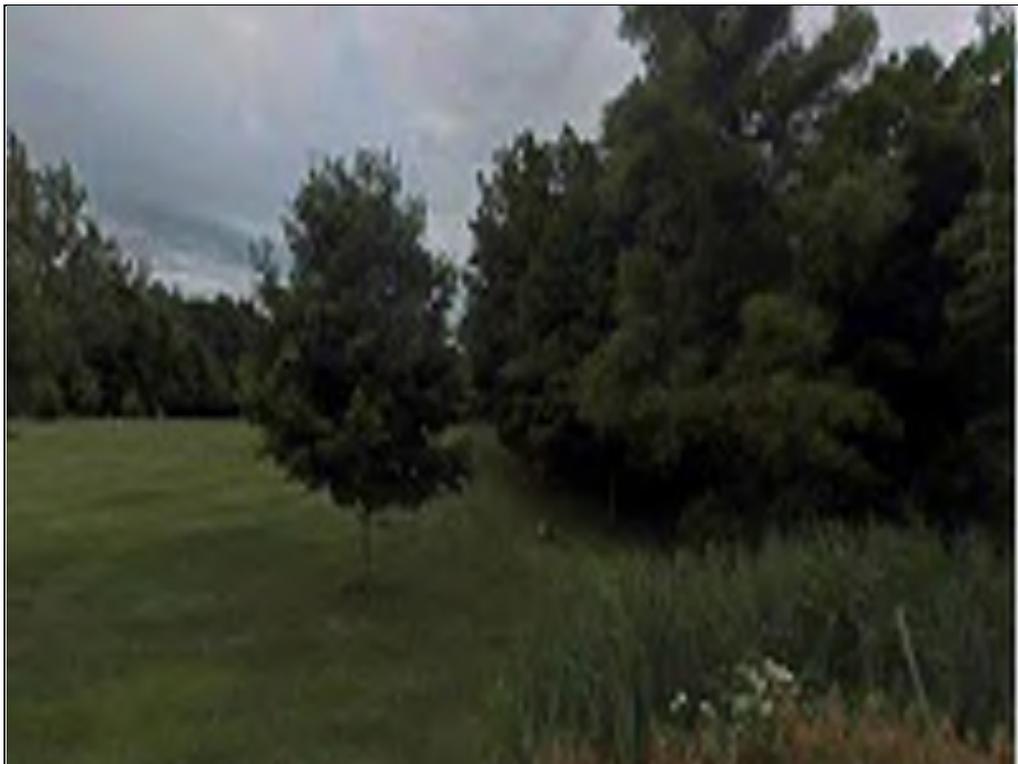


Photo 87: UNT 11, viewing north, 06/20/2019 (Figure 4, Sheet 24)



Photo 88: UNT 11, viewing west, 06/20/2019 (Figure 4, Sheet 24)



Photo 89: UNT 11, viewing west, 06/20/2019 (Figure 4, Sheet 24)



Photo 90: UNT 12, viewing southwest, 02/11/2020 (Figure 4, Sheet 25)



Photo 91: UNT 12, viewing west, 02/11/2020 (Figure 4, Sheet 25)



Photo 92: UNT 12, viewing east, 02/11/2020 (Figure 4, Sheet 25)



Photo 93: UNT 12, viewing south, 02/11/2020 (Figure 4, Sheet 25)



Photo 94: UNT 12, viewing south, 02/11/2020 (Figure 4, Sheet 25)



Photo 95: UNT 12, viewing east, 02/11/2020 (Figure 4, Sheet 25)



Photo 96: UNT 12, viewing south, 06/20/2019 (Figure 4, Sheet 25)



Photo 97: UNT 12, viewing west, 02/11/2020 (Figure 4, Sheet 25)



WETLAND DETERMINATION DATA FORM – Midwest Region

Project/Site: Des # 1601074 SR 38 HMA Overlay and Minor Structural City/County: Tippecanoe County Sampling Date: 06/18 and 06/20/2019
 Applicant/Owner: INDOT Crawfordsville District State: IN Sampling Point: A1
 Investigator(s): Shawn Gibbs, Tamra Reece, Ali Whitehead Section, Township, Range: S4, T22, R3W
 Landform (hillside, terrace, etc.): Terrace Local relief (concave, convex, none): concave
 Slope (%): 0 Lat: 40.375472 Long: -86.752354 Datum: NAD83
 Soil Map Unit Name: Ou, Ouiatenon sandy loam, 0 - 2 percent slope NWI classification: PEM1A

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No (If no, explain in Remarks.)
 Are Vegetation , Soil x, or Hydrology significantly disturbed? Are "Normal Circumstances" present? Yes X No
 Are Vegetation , Soil , or Hydrology naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <u> </u> No <u>X</u> Hydric Soil Present? Yes <u> </u> No <u>X</u> Wetland Hydrology Present? Yes <u> </u> No <u>X</u>	Is the Sampled Area within a Wetland? Yes <u> </u> No <u>X</u>
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Remarks:
 A test pit reached termination at approximately 14 inches below ground surface (bgs). The presence of riprap along the slope of the roadway and within the ditch area suggests the area was stabilized with riprap upon the construction of the bridge. Riprap within the test pit would suggest disturbed soils. The area is surrounded by mow yards and forested areas. Due to manipulation from the roadway and bridge, the NWI wetland is

VEGETATION – Use scientific names of plants.

Tree Stratum (Plot size: <u>20 feet</u>)	Absolute % Cover	Dominant Species?	Indicator Status																	
1. <u>Celtis occidentalis</u>	15	Yes	FAC	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>4</u> (A) Total Number of Dominant Species Across All Strata: <u>9</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>44.4%</u> (A/B)																
2. <u>Acer saccharum</u>	15	Yes	FACU																	
3. <u>Acer pseudoplatanus</u>	15	Yes	UPL																	
4. <u>Morus alba</u>	10	No	FAC																	
5. <u>Juglans nigra</u>	5	No	FACU																	
60 =Total Cover				Prevalence Index worksheet: <table style="width: 100%; border-collapse: collapse;"> <tr> <td style="text-align: right;">Total % Cover of:</td> <td style="text-align: right;">Multiply by:</td> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0</u></td> </tr> <tr> <td>FACW species <u>5</u></td> <td>x 2 = <u>10</u></td> </tr> <tr> <td>FAC species <u>55</u></td> <td>x 3 = <u>165</u></td> </tr> <tr> <td>FACU species <u>90</u></td> <td>x 4 = <u>360</u></td> </tr> <tr> <td>UPL species <u>15</u></td> <td>x 5 = <u>75</u></td> </tr> <tr> <td>Column Totals: <u>165</u> (A)</td> <td><u>610</u> (B)</td> </tr> <tr> <td colspan="2">Prevalence Index = B/A = <u>3.70</u></td> </tr> </table>	Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0</u>	FACW species <u>5</u>	x 2 = <u>10</u>	FAC species <u>55</u>	x 3 = <u>165</u>	FACU species <u>90</u>	x 4 = <u>360</u>	UPL species <u>15</u>	x 5 = <u>75</u>	Column Totals: <u>165</u> (A)	<u>610</u> (B)	Prevalence Index = B/A = <u>3.70</u>	
Total % Cover of:	Multiply by:																			
OBL species <u>0</u>	x 1 = <u>0</u>																			
FACW species <u>5</u>	x 2 = <u>10</u>																			
FAC species <u>55</u>	x 3 = <u>165</u>																			
FACU species <u>90</u>	x 4 = <u>360</u>																			
UPL species <u>15</u>	x 5 = <u>75</u>																			
Column Totals: <u>165</u> (A)	<u>610</u> (B)																			
Prevalence Index = B/A = <u>3.70</u>																				
25 =Total Cover																				
75 =Total Cover																				
5 =Total Cover																				
5 =Total Cover																				

Remarks: (Include photo numbers here or on a separate sheet.)

SOIL

Sampling Point: A1

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)								
Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
0-12	10YR 3/2	97	10YR 4/6	3	C	M	Loamy/Clayey	
12-14	10YR 2/1	97	10YR 4/6	3	C	M	Loamy/Clayey	

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains.

²Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators:

- Histosol (A1)
- Histic Epipedon (A2)
- Black Histic (A3)
- Hydrogen Sulfide (A4)
- Stratified Layers (A5)
- 2 cm Muck (A10)
- Depleted Below Dark Surface (A11)
- Thick Dark Surface (A12)
- Sandy Mucky Mineral (S1)
- 5 cm Mucky Peat or Peat (S3)
- Sandy Gleyed Matrix (S4)
- Sandy Redox (S5)
- Stripped Matrix (S6)
- Dark Surface (S7)
- Loamy Mucky Mineral (F1)
- Loamy Gleyed Matrix (F2)
- Depleted Matrix (F3)
- Redox Dark Surface (F6)
- Depleted Dark Surface (F7)
- Redox Depressions (F8)

Indicators for Problematic Hydric Soils³:

- Coast Prairie Redox (A16)
- Iron-Manganese Masses (F12)
- Red Parent Material (F21)
- Very Shallow Dark Surface (F22)
- Other (Explain in Remarks)

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if observed):

Type: stone, gravel and riprap
 Depth (inches): 14

Hydric Soil Present? Yes No

Remarks:

The shovel probe reached termination at 14 inches bgs. The restrictive layer is likely from the construction of the adjacent roadway and bridge and indicates highly disturbed soils.

HYDROLOGY

Wetland Hydrology Indicators:

 Primary Indicators (minimum of one is required; check all that apply)

- Surface Water (A1)
- High Water Table (A2)
- Saturation (A3)
- Water Marks (B1)
- Sediment Deposits (B2)
- Drift Deposits (B3)
- Algal Mat or Crust (B4)
- Iron Deposits (B5)
- Inundation Visible on Aerial Imagery (B7)
- Sparsely Vegetated Concave Surface (B8)
- Water-Stained Leaves (B9)
- Aquatic Fauna (B13)
- True Aquatic Plants (B14)
- Hydrogen Sulfide Odor (C1)
- Oxidized Rhizospheres on Living Roots (C3)
- Presence of Reduced Iron (C4)
- Recent Iron Reduction in Tilled Soils (C6)
- Thin Muck Surface (C7)
- Gauge or Well Data (D9)
- Other (Explain in Remarks)

 Secondary Indicators (minimum of two required)

- Surface Soil Cracks (B6)
- Drainage Patterns (B10)
- Dry-Season Water Table (C2)
- Crayfish Burrows (C8)
- Saturation Visible on Aerial Imagery (C9)
- Stunted or Stressed Plants (D1)
- Geomorphic Position (D2)
- FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes No Depth (inches):
 Water Table Present? Yes No Depth (inches):
 Saturation Present? Yes No Depth (inches):
 (includes capillary fringe)

Wetland Hydrology Present? Yes No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM – Midwest Region

Project/Site: Des # 1601074 SR 38 HMA Overlay and Minor Structural City/County: Clinton County Sampling Date: 06/18 and 06/20/2019
 Applicant/Owner: INDOT Crawfordsville District State: IN Sampling Point: B1
 Investigator(s): Shawn Gibbs, Tamra Reece, Ali Whitehead Section, Township, Range: S18, T22, R2W
 Landform (hillside, terrace, etc.): Terrace Local relief (concave, convex, none): concave
 Slope (%): 0 Lat: 40.350185 Long: -86.682911 Datum: NAD83
 Soil Map Unit Name: MX, Milford silty clay loam, 0 - 2 percent slope NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No (If no, explain in Remarks.)
 Are Vegetation , Soil x, or Hydrology significantly disturbed? Are "Normal Circumstances" present? Yes X No
 Are Vegetation , Soil , or Hydrology naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <u> </u> No <u>X</u> Hydric Soil Present? Yes <u> </u> No <u>X</u> Wetland Hydrology Present? Yes <u> </u> No <u>X</u>	Is the Sampled Area within a Wetland? Yes <u> </u> No <u>X</u>
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Remarks:
 The data point was taken adjacent to a vegetated drainage channel (UNT 3), which had water at the time of the investigation. The data point was surrounded by mown lawns and agricultural fields. The shovel probe reached termination at approximately 12-inches below ground surface (bgs). The presence of stone and gravel within the study area suggests disturbed soils.

VEGETATION – Use scientific names of plants.

Tree Stratum	(Plot size: <u>20 feet</u>)	Absolute % Cover	Dominant Species?	Indicator Status																	
1.	_____	_____	_____	_____	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A) Total Number of Dominant Species Across All Strata: <u>3</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>33.3%</u> (A/B)																
2.	_____	_____	_____	_____																	
3.	_____	_____	_____	_____																	
4.	_____	_____	_____	_____																	
5.	_____	_____	_____	_____																	
=Total Cover																					
Sapling/Shrub Stratum	(Plot size: <u>10 feet</u>)																				
1.	_____	_____	_____	_____	Prevalence Index worksheet: <table style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 50%;">Total % Cover of:</td> <td style="width: 50%;">Multiply by:</td> </tr> <tr> <td>OBL species <u>30</u></td> <td>x 1 = <u>30</u></td> </tr> <tr> <td>FACW species <u>15</u></td> <td>x 2 = <u>30</u></td> </tr> <tr> <td>FAC species <u>10</u></td> <td>x 3 = <u>30</u></td> </tr> <tr> <td>FACU species <u>25</u></td> <td>x 4 = <u>100</u></td> </tr> <tr> <td>UPL species <u>20</u></td> <td>x 5 = <u>100</u></td> </tr> <tr> <td>Column Totals: <u>100</u> (A)</td> <td><u>290</u> (B)</td> </tr> <tr> <td colspan="2">Prevalence Index = B/A = <u>2.90</u></td> </tr> </table>	Total % Cover of:	Multiply by:	OBL species <u>30</u>	x 1 = <u>30</u>	FACW species <u>15</u>	x 2 = <u>30</u>	FAC species <u>10</u>	x 3 = <u>30</u>	FACU species <u>25</u>	x 4 = <u>100</u>	UPL species <u>20</u>	x 5 = <u>100</u>	Column Totals: <u>100</u> (A)	<u>290</u> (B)	Prevalence Index = B/A = <u>2.90</u>	
Total % Cover of:	Multiply by:																				
OBL species <u>30</u>	x 1 = <u>30</u>																				
FACW species <u>15</u>	x 2 = <u>30</u>																				
FAC species <u>10</u>	x 3 = <u>30</u>																				
FACU species <u>25</u>	x 4 = <u>100</u>																				
UPL species <u>20</u>	x 5 = <u>100</u>																				
Column Totals: <u>100</u> (A)	<u>290</u> (B)																				
Prevalence Index = B/A = <u>2.90</u>																					
2.	_____	_____	_____	_____																	
3.	_____	_____	_____	_____																	
4.	_____	_____	_____	_____																	
5.	_____	_____	_____	_____																	
=Total Cover																					
Herb Stratum	(Plot size: <u>5 feet</u>)																				
1.	<u>Typha latifolia</u>	<u>30</u>	<u>Yes</u>	<u>OBL</u>	Hydrophytic Vegetation Indicators: <u> </u> 1 - Rapid Test for Hydrophytic Vegetation <u> </u> 2 - Dominance Test is >50% <u> </u> 3 - Prevalence Index is ≤3.0 ¹ <u> </u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u> </u> Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.																
2.	<u>Bromus inermis</u>	<u>25</u>	<u>Yes</u>	<u>FACU</u>																	
3.	<u>Asclepias longifolia</u>	<u>20</u>	<u>Yes</u>	<u>UPL</u>																	
4.	<u>Impatiens capensis</u>	<u>15</u>	<u>No</u>	<u>FACW</u>																	
5.	<u>Toxicodendron radicans</u>	<u>10</u>	<u>No</u>	<u>FAC</u>																	
6.	_____	_____	_____	_____																	
7.	_____	_____	_____	_____																	
8.	_____	_____	_____	_____																	
9.	_____	_____	_____	_____																	
10.	_____	_____	_____	_____																	
100 =Total Cover																					
Woody Vine Stratum	(Plot size: <u>5 feet</u>)																				
1.	_____	_____	_____	_____	Hydrophytic Vegetation Present? Yes <u> </u> No <u>X</u>																
2.	_____	_____	_____	_____																	
=Total Cover																					

Remarks: (Include photo numbers here or on a separate sheet.)

SOIL

Sampling Point: B1

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)								
Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
0-12	10YR 2/2	97	10YR 4/6	3	C	M	Loamy/Clayey	

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains.

²Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators:	Indicators for Problematic Hydric Soils ³ :
<input type="checkbox"/> Histosol (A1)	<input type="checkbox"/> Coast Prairie Redox (A16)
<input type="checkbox"/> Histic Epipedon (A2)	<input type="checkbox"/> Iron-Manganese Masses (F12)
<input type="checkbox"/> Black Histic (A3)	<input type="checkbox"/> Red Parent Material (F21)
<input type="checkbox"/> Hydrogen Sulfide (A4)	<input type="checkbox"/> Very Shallow Dark Surface (F22)
<input type="checkbox"/> Stratified Layers (A5)	<input type="checkbox"/> Other (Explain in Remarks)
<input type="checkbox"/> 2 cm Muck (A10)	
<input type="checkbox"/> Depleted Below Dark Surface (A11)	
<input type="checkbox"/> Thick Dark Surface (A12)	
<input type="checkbox"/> Sandy Mucky Mineral (S1)	
<input type="checkbox"/> 5 cm Mucky Peat or Peat (S3)	
<input type="checkbox"/> Sandy Gleyed Matrix (S4)	
<input type="checkbox"/> Sandy Redox (S5)	
<input type="checkbox"/> Stripped Matrix (S6)	
<input type="checkbox"/> Dark Surface (S7)	
<input type="checkbox"/> Loamy Mucky Mineral (F1)	
<input type="checkbox"/> Loamy Gleyed Matrix (F2)	
<input type="checkbox"/> Depleted Matrix (F3)	
<input type="checkbox"/> Redox Dark Surface (F6)	
<input type="checkbox"/> Depleted Dark Surface (F7)	
<input type="checkbox"/> Redox Depressions (F8)	

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if observed): Type: <u> </u> Gravel with large stones Depth (inches): <u> </u> 12	Hydric Soil Present? Yes <u> </u> No <u> X </u>
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Remarks:
 At a depth of 12 inches the shovel probe reached termination due to a restrictive layer of stone and gravel, indicators of disturbed soil. The adjacent ditch, a vegetative drainage channel (UNT 3) accepts water from the surrounding mown lawn and agricultural fields. This site appears to be well drained.

HYDROLOGY

Wetland Hydrology Indicators:	Primary Indicators (minimum of one is required; check all that apply)	Secondary Indicators (minimum of two required)
<input type="checkbox"/> Surface Water (A1)	<input type="checkbox"/> Water-Stained Leaves (B9)	<input type="checkbox"/> Surface Soil Cracks (B6)
<input type="checkbox"/> High Water Table (A2)	<input type="checkbox"/> Aquatic Fauna (B13)	<input type="checkbox"/> Drainage Patterns (B10)
<input type="checkbox"/> Saturation (A3)	<input type="checkbox"/> True Aquatic Plants (B14)	<input type="checkbox"/> Dry-Season Water Table (C2)
<input type="checkbox"/> Water Marks (B1)	<input type="checkbox"/> Hydrogen Sulfide Odor (C1)	<input type="checkbox"/> Crayfish Burrows (C8)
<input type="checkbox"/> Sediment Deposits (B2)	<input type="checkbox"/> Oxidized Rhizospheres on Living Roots (C3)	<input type="checkbox"/> Saturation Visible on Aerial Imagery (C9)
<input type="checkbox"/> Drift Deposits (B3)	<input type="checkbox"/> Presence of Reduced Iron (C4)	<input type="checkbox"/> Stunted or Stressed Plants (D1)
<input type="checkbox"/> Algal Mat or Crust (B4)	<input type="checkbox"/> Recent Iron Reduction in Tilled Soils (C6)	<input type="checkbox"/> Geomorphic Position (D2)
<input type="checkbox"/> Iron Deposits (B5)	<input type="checkbox"/> Thin Muck Surface (C7)	<input type="checkbox"/> FAC-Neutral Test (D5)
<input type="checkbox"/> Inundation Visible on Aerial Imagery (B7)	<input type="checkbox"/> Gauge or Well Data (D9)	
<input type="checkbox"/> Sparsely Vegetated Concave Surface (B8)	<input type="checkbox"/> Other (Explain in Remarks)	

Field Observations: Surface Water Present? Yes <u> </u> No <u> x </u> Depth (inches): <u> </u> Water Table Present? Yes <u> </u> No <u> x </u> Depth (inches): <u> </u> Saturation Present? Yes <u> </u> No <u> x </u> Depth (inches): <u> </u> (includes capillary fringe)	Wetland Hydrology Present? Yes <u> </u> No <u> X </u>
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Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM – Midwest Region

Project/Site: Des # 1601074 SR 38 HMA Overlay and Minor Structural City/County: Clinton County Sampling Date: 06/18 and 06/20/2019
 Applicant/Owner: INDOT Crawfordsville District State: IN Sampling Point: C1
 Investigator(s): Shawn Gibbs, Tamra Reece, Ali Whitehead Section, Township, Range: S24, T22, R2W
 Landform (hillside, terrace, etc.): Terrace Local relief (concave, convex, none): Concave
 Slope (%): 0 Lat: 40.344311 Long: -86.580976 Datum: NAD83
 Soil Map Unit Name: RuB, Russel silt loam, 2-6 percent slope NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No (If no, explain in Remarks.)
 Are Vegetation , Soil , or Hydrology significantly disturbed? Are "Normal Circumstances" present? Yes X No
 Are Vegetation , Soil , or Hydrology naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <u>X</u> No <u> </u> Hydric Soil Present? Yes <u>X</u> No <u> </u> Wetland Hydrology Present? Yes <u>X</u> No <u> </u>	Is the Sampled Area within a Wetland? Yes <u>X</u> No <u> </u>
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Remarks:
 The sampling point was located within an area containing cattails along the ditch area south of SR 38 and west of North County Road 400 West. The presence of standing water was observed where the property owner constructed an access road and restricted the water flow into the ditch. The area is surrounded by mow yards, agricultural fields, and forested areas.

VEGETATION – Use scientific names of plants.

Tree Stratum	(Plot size: <u>20</u>)	Absolute % Cover	Dominant Species?	Indicator Status																	
1.	_____	_____	_____	_____	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A) Total Number of Dominant Species Across All Strata: <u>1</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>100.0%</u> (A/B)																
2.	_____	_____	_____	_____																	
3.	_____	_____	_____	_____																	
4.	_____	_____	_____	_____																	
5.	_____	_____	_____	_____																	
		=Total Cover																			
Sapling/Shrub Stratum	(Plot size: <u>10</u>)																				
1.	_____	_____	_____	_____	Prevalence Index worksheet: <table style="width: 100%; border-collapse: collapse;"> <tr> <td style="text-align: right;">Total % Cover of:</td> <td style="text-align: center;">Multiply by:</td> </tr> <tr> <td>OBL species <u>100</u></td> <td>x 1 = <u>100</u></td> </tr> <tr> <td>FACW species <u>0</u></td> <td>x 2 = <u>0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0</u></td> </tr> <tr> <td>Column Totals: <u>100</u> (A)</td> <td><u>100</u> (B)</td> </tr> <tr> <td colspan="2">Prevalence Index = B/A = <u>1.00</u></td> </tr> </table>	Total % Cover of:	Multiply by:	OBL species <u>100</u>	x 1 = <u>100</u>	FACW species <u>0</u>	x 2 = <u>0</u>	FAC species <u>0</u>	x 3 = <u>0</u>	FACU species <u>0</u>	x 4 = <u>0</u>	UPL species <u>0</u>	x 5 = <u>0</u>	Column Totals: <u>100</u> (A)	<u>100</u> (B)	Prevalence Index = B/A = <u>1.00</u>	
Total % Cover of:	Multiply by:																				
OBL species <u>100</u>	x 1 = <u>100</u>																				
FACW species <u>0</u>	x 2 = <u>0</u>																				
FAC species <u>0</u>	x 3 = <u>0</u>																				
FACU species <u>0</u>	x 4 = <u>0</u>																				
UPL species <u>0</u>	x 5 = <u>0</u>																				
Column Totals: <u>100</u> (A)	<u>100</u> (B)																				
Prevalence Index = B/A = <u>1.00</u>																					
2.	_____	_____	_____	_____																	
3.	_____	_____	_____	_____																	
4.	_____	_____	_____	_____																	
5.	_____	_____	_____	_____																	
		=Total Cover																			
Herb Stratum	(Plot size: <u>5</u>)																				
1.	<u>Typha latifolia</u>	<u>100</u>	<u>Yes</u>	<u>OBL</u>	Hydrophytic Vegetation Indicators: <u> </u> 1 - Rapid Test for Hydrophytic Vegetation <u>X</u> 2 - Dominance Test is >50% <u>X</u> 3 - Prevalence Index is ≤3.0 ¹ <u> </u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u> </u> Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.																
2.	_____	_____	_____	_____																	
3.	_____	_____	_____	_____																	
4.	_____	_____	_____	_____																	
5.	_____	_____	_____	_____																	
6.	_____	_____	_____	_____																	
7.	_____	_____	_____	_____																	
8.	_____	_____	_____	_____																	
9.	_____	_____	_____	_____																	
10.	_____	_____	_____	_____																	
		<u>100</u> =Total Cover																			
Woody Vine Stratum	(Plot size: <u>5</u>)																				
1.	_____	_____	_____	_____	Hydrophytic Vegetation Present? Yes <u>X</u> No <u> </u>																
2.	_____	_____	_____	_____																	
		=Total Cover																			

Remarks: (Include photo numbers here or on a separate sheet.)

SOIL

Sampling Point: C1

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)								
Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
0-12	10YR 2/1	97	10YR 4/6	3	C	M	Loamy/Clayey	
12-16	10YR 2/1	97	10YR 4/6	3	C	M	Loamy/Clayey	

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains.

²Location: PL=Pore Lining, M=Matrix.

<p>Hydric Soil Indicators:</p> <p><input type="checkbox"/> Histosol (A1)</p> <p><input type="checkbox"/> Histic Epipedon (A2)</p> <p><input type="checkbox"/> Black Histic (A3)</p> <p><input type="checkbox"/> Hydrogen Sulfide (A4)</p> <p><input type="checkbox"/> Stratified Layers (A5)</p> <p><input type="checkbox"/> 2 cm Muck (A10)</p> <p><input type="checkbox"/> Depleted Below Dark Surface (A11)</p> <p><input type="checkbox"/> Thick Dark Surface (A12)</p> <p><input type="checkbox"/> Sandy Mucky Mineral (S1)</p> <p><input type="checkbox"/> 5 cm Mucky Peat or Peat (S3)</p>	<p><input type="checkbox"/> Sandy Gleyed Matrix (S4)</p> <p><input type="checkbox"/> Sandy Redox (S5)</p> <p><input type="checkbox"/> Stripped Matrix (S6)</p> <p><input type="checkbox"/> Dark Surface (S7)</p> <p><input type="checkbox"/> Loamy Mucky Mineral (F1)</p> <p><input type="checkbox"/> Loamy Gleyed Matrix (F2)</p> <p><input type="checkbox"/> Depleted Matrix (F3)</p> <p><input checked="" type="checkbox"/> Redox Dark Surface (F6)</p> <p><input type="checkbox"/> Depleted Dark Surface (F7)</p> <p><input type="checkbox"/> Redox Depressions (F8)</p>	<p>Indicators for Problematic Hydric Soils³:</p> <p><input type="checkbox"/> Coast Prairie Redox (A16)</p> <p><input type="checkbox"/> Iron-Manganese Masses (F12)</p> <p><input type="checkbox"/> Red Parent Material (F21)</p> <p><input type="checkbox"/> Very Shallow Dark Surface (F22)</p> <p><input type="checkbox"/> Other (Explain in Remarks)</p>
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³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

<p>Restrictive Layer (if observed):</p> <p>Type: _____</p> <p>Depth (inches): _____</p>	<p>Hydric Soil Present? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/></p>
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Remarks:

HYDROLOGY

<p>Wetland Hydrology Indicators:</p> <p>Primary Indicators (minimum of one is required; check all that apply)</p> <p><input checked="" type="checkbox"/> Surface Water (A1)</p> <p><input type="checkbox"/> High Water Table (A2)</p> <p><input checked="" type="checkbox"/> Saturation (A3)</p> <p><input type="checkbox"/> Water Marks (B1)</p> <p><input type="checkbox"/> Sediment Deposits (B2)</p> <p><input type="checkbox"/> Drift Deposits (B3)</p> <p><input type="checkbox"/> Algal Mat or Crust (B4)</p> <p><input type="checkbox"/> Iron Deposits (B5)</p> <p><input type="checkbox"/> Inundation Visible on Aerial Imagery (B7)</p> <p><input type="checkbox"/> Sparsely Vegetated Concave Surface (B8)</p>	<p>Secondary Indicators (minimum of two required)</p> <p><input type="checkbox"/> Water-Stained Leaves (B9)</p> <p><input type="checkbox"/> Aquatic Fauna (B13)</p> <p><input type="checkbox"/> True Aquatic Plants (B14)</p> <p><input type="checkbox"/> Hydrogen Sulfide Odor (C1)</p> <p><input type="checkbox"/> Oxidized Rhizospheres on Living Roots (C3)</p> <p><input type="checkbox"/> Presence of Reduced Iron (C4)</p> <p><input type="checkbox"/> Recent Iron Reduction in Tilled Soils (C6)</p> <p><input type="checkbox"/> Thin Muck Surface (C7)</p> <p><input type="checkbox"/> Gauge or Well Data (D9)</p> <p><input type="checkbox"/> Other (Explain in Remarks)</p>
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<p>Field Observations:</p> <p>Surface Water Present? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> Depth (inches): <u> 2 </u></p> <p>Water Table Present? Yes <input type="checkbox"/> No <input type="checkbox"/> Depth (inches): _____</p> <p>Saturation Present? Yes <input type="checkbox"/> No <input type="checkbox"/> Depth (inches): _____</p> <p>(includes capillary fringe)</p>	<p>Wetland Hydrology Present? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/></p>
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Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:
The data point was taken adjacent to the drainage ditch that conveys water from agricultural fields, mown lawns and forested areas to the Kilmore Creek.

WETLAND DETERMINATION DATA FORM – Midwest Region

Project/Site: Des # 1601074 SR 38 HMA Overlay and Minor Structural City/County: Clinton County Sampling Date: 09/01/2019
 Applicant/Owner: INDOT Crawfordsville District State: IN Sampling Point: C2
 Investigator(s): Preston Marucco Section, Township, Range: S24, T22, R2W
 Landform (hillside, terrace, etc.): Terrace Local relief (concave, convex, none): Concave
 Slope (%): 2-5 Lat: 40.344273 Long: -86.580932 Datum: NAD83
 Soil Map Unit Name: RuB, Russel silt loam, 2-6 percent slope NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No (If no, explain in Remarks.)
 Are Vegetation , Soil , or Hydrology significantly disturbed? Are "Normal Circumstances" present? Yes X No
 Are Vegetation , Soil , or Hydrology naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <u> </u> No <u>X</u> Hydric Soil Present? Yes <u> </u> No <u>X</u> Wetland Hydrology Present? Yes <u> </u> No <u>X</u>	Is the Sampled Area within a Wetland? Yes <u> </u> No <u>X</u>
Remarks: Site consists of a mown lawn adjacent to a forested area.	

VEGETATION – Use scientific names of plants.

Tree Stratum	Plot size: <u>20</u>	Absolute % Cover	Dominant Species?	Indicator Status																																	
1. <u>Acer saccharum</u>		20	Yes	FACU	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>0</u> (A) Total Number of Dominant Species Across All Strata: <u>2</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.0%</u> (A/B)																																
2. _____																																					
3. _____																																					
4. _____																																					
5. _____																																					
		20 =Total Cover																																			
Sapling/Shrub Stratum	Plot size: <u>10</u>				Prevalence Index worksheet: <table style="width: 100%; border-collapse: collapse;"> <tr> <td style="text-align: right;">Total % Cover of:</td> <td></td> <td style="text-align: right;">Multiply by:</td> <td></td> </tr> <tr> <td>OBL species</td> <td style="text-align: center;"><u>0</u></td> <td>x 1 =</td> <td style="text-align: center;"><u>0</u></td> </tr> <tr> <td>FACW species</td> <td style="text-align: center;"><u>0</u></td> <td>x 2 =</td> <td style="text-align: center;"><u>0</u></td> </tr> <tr> <td>FAC species</td> <td style="text-align: center;"><u>0</u></td> <td>x 3 =</td> <td style="text-align: center;"><u>0</u></td> </tr> <tr> <td>FACU species</td> <td style="text-align: center;"><u>20</u></td> <td>x 4 =</td> <td style="text-align: center;"><u>80</u></td> </tr> <tr> <td>UPL species</td> <td style="text-align: center;"><u>0</u></td> <td>x 5 =</td> <td style="text-align: center;"><u>0</u></td> </tr> <tr> <td>Column Totals:</td> <td style="text-align: center;"><u>20</u> (A)</td> <td></td> <td style="text-align: center;"><u>80</u> (B)</td> </tr> <tr> <td colspan="4">Prevalence Index = B/A = <u>4.00</u></td> </tr> </table>	Total % Cover of:		Multiply by:		OBL species	<u>0</u>	x 1 =	<u>0</u>	FACW species	<u>0</u>	x 2 =	<u>0</u>	FAC species	<u>0</u>	x 3 =	<u>0</u>	FACU species	<u>20</u>	x 4 =	<u>80</u>	UPL species	<u>0</u>	x 5 =	<u>0</u>	Column Totals:	<u>20</u> (A)		<u>80</u> (B)	Prevalence Index = B/A = <u>4.00</u>			
Total % Cover of:		Multiply by:																																			
OBL species	<u>0</u>	x 1 =	<u>0</u>																																		
FACW species	<u>0</u>	x 2 =	<u>0</u>																																		
FAC species	<u>0</u>	x 3 =	<u>0</u>																																		
FACU species	<u>20</u>	x 4 =	<u>80</u>																																		
UPL species	<u>0</u>	x 5 =	<u>0</u>																																		
Column Totals:	<u>20</u> (A)		<u>80</u> (B)																																		
Prevalence Index = B/A = <u>4.00</u>																																					
1. _____																																					
2. _____																																					
3. _____																																					
4. _____																																					
5. _____																																					
		=Total Cover																																			
Herb Stratum	Plot size: <u>5</u>				Hydrophytic Vegetation Indicators: <u> </u> 1 - Rapid Test for Hydrophytic Vegetation <u> </u> 2 - Dominance Test is >50% <u> </u> 3 - Prevalence Index is ≤3.0 ¹ <u> </u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u> </u> Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.																																
1. <u>Mown lawn</u>		100	Yes																																		
2. _____																																					
3. _____																																					
4. _____																																					
5. _____																																					
6. _____																																					
7. _____																																					
8. _____																																					
9. _____																																					
10. _____																																					
		100 =Total Cover																																			
Woody Vine Stratum	Plot size: <u>5</u>				Hydrophytic Vegetation Present? Yes <u> </u> No <u>X</u>																																
1. _____																																					
2. _____																																					
		=Total Cover																																			
Remarks: (Include photo numbers here or on a separate sheet.) Entire area consists of mown lawn and a single sugar maple (Acer saccharum)																																					

SOIL

Sampling Point: C2

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)								
Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
0-10	10YR 4/3	100					Loamy/Clayey	Loamey clay

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains.

²Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: <input type="checkbox"/> Histosol (A1) <input type="checkbox"/> Histic Epipedon (A2) <input type="checkbox"/> Black Histic (A3) <input type="checkbox"/> Hydrogen Sulfide (A4) <input type="checkbox"/> Stratified Layers (A5) <input type="checkbox"/> 2 cm Muck (A10) <input type="checkbox"/> Depleted Below Dark Surface (A11) <input type="checkbox"/> Thick Dark Surface (A12) <input type="checkbox"/> Sandy Mucky Mineral (S1) <input type="checkbox"/> 5 cm Mucky Peat or Peat (S3)	<input type="checkbox"/> Sandy Gleyed Matrix (S4) <input type="checkbox"/> Sandy Redox (S5) <input type="checkbox"/> Stripped Matrix (S6) <input type="checkbox"/> Dark Surface (S7) <input type="checkbox"/> Loamy Mucky Mineral (F1) <input type="checkbox"/> Loamy Gleyed Matrix (F2) <input type="checkbox"/> Depleted Matrix (F3) <input type="checkbox"/> Redox Dark Surface (F6) <input type="checkbox"/> Depleted Dark Surface (F7) <input type="checkbox"/> Redox Depressions (F8)	Indicators for Problematic Hydric Soils³: <input type="checkbox"/> Coast Prairie Redox (A16) <input type="checkbox"/> Iron-Manganese Masses (F12) <input type="checkbox"/> Red Parent Material (F21) <input type="checkbox"/> Very Shallow Dark Surface (F22) <input type="checkbox"/> Other (Explain in Remarks)
---	--	--

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if observed): Type: <u> Rock/Gravel </u> Depth (inches): <u> 10 </u>	Hydric Soil Present? Yes <u> </u> No <u> X </u>
--	---

Remarks:
 At a depth of 10 inches the shovel probe reached termination due to a restrictive layer of rock and gravel.

HYDROLOGY

Wetland Hydrology Indicators: <u>Primary Indicators (minimum of one is required; check all that apply)</u> <input type="checkbox"/> Surface Water (A1) <input type="checkbox"/> High Water Table (A2) <input type="checkbox"/> Saturation (A3) <input type="checkbox"/> Water Marks (B1) <input type="checkbox"/> Sediment Deposits (B2) <input type="checkbox"/> Drift Deposits (B3) <input type="checkbox"/> Algal Mat or Crust (B4) <input type="checkbox"/> Iron Deposits (B5) <input type="checkbox"/> Inundation Visible on Aerial Imagery (B7) <input type="checkbox"/> Sparsely Vegetated Concave Surface (B8)	<input type="checkbox"/> Water-Stained Leaves (B9) <input type="checkbox"/> Aquatic Fauna (B13) <input type="checkbox"/> True Aquatic Plants (B14) <input type="checkbox"/> Hydrogen Sulfide Odor (C1) <input type="checkbox"/> Oxidized Rhizospheres on Living Roots (C3) <input type="checkbox"/> Presence of Reduced Iron (C4) <input type="checkbox"/> Recent Iron Reduction in Tilled Soils (C6) <input type="checkbox"/> Thin Muck Surface (C7) <input type="checkbox"/> Gauge or Well Data (D9) <input type="checkbox"/> Other (Explain in Remarks)	<u>Secondary Indicators (minimum of two required)</u> <input type="checkbox"/> Surface Soil Cracks (B6) <input type="checkbox"/> Drainage Patterns (B10) <input type="checkbox"/> Dry-Season Water Table (C2) <input type="checkbox"/> Crayfish Burrows (C8) <input type="checkbox"/> Saturation Visible on Aerial Imagery (C9) <input type="checkbox"/> Stunted or Stressed Plants (D1) <input type="checkbox"/> Geomorphic Position (D2) <input type="checkbox"/> FAC-Neutral Test (D5)
--	---	---

Field Observations: Surface Water Present? Yes <u> </u> No <u> X </u> Depth (inches): <u> </u> Water Table Present? Yes <u> </u> No <u> X </u> Depth (inches): <u> </u> Saturation Present? Yes <u> </u> No <u> X </u> Depth (inches): <u> </u> (includes capillary fringe)	Wetland Hydrology Present? Yes <u> </u> No <u> X </u>
---	---

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:
 The area appears to be well drained.

Appendix 2 - PRELIMINARY JURISDICTIONAL DETERMINATION (PJD) FORM

BACKGROUND INFORMATION

A. REPORT COMPLETION DATE FOR PJD: October 21, 2019

B. NAME AND ADDRESS OF PERSON REQUESTING PJD: Tamra L. Reece, 7820 Innovation Blvd, Suite 200, Indianapolis, IN 46278

C. DISTRICT OFFICE, FILE NAME, AND NUMBER:

D. PROJECT LOCATION(S) AND BACKGROUND INFORMATION:

The proposed project consists of mill and overlay of the roadway and widening of the shoulders from 1.18 miles east of I-65 within the town of Dayton to SR 39/US 421 west junction. Guardrail is anticipated to be installed where necessary. Through the Town of Mulberry, the project involves mill and overlay of the roadway with replacement of curb and gutter and curb ramps. The installation of street parking may be included through the Town of Mulberry. Replacement, extension, grouting, and/or cleaning is recommended for approximately 32 drainage structures.

(USE THE TABLE BELOW TO DOCUMENT MULTIPLE AQUATIC RESOURCES AND/OR AQUATIC RESOURCES AT DIFFERENT SITES)

State: **IN** County/parish/borough: Tippecanoe and Clinton Counties City: Dayton and Mull

Center coordinates of site (lat/long in degree decimal format):

Lat.: **40.3740** Long.: **-86.5671**

Universal Transverse Mercator: **NAD83**

Name of nearest waterbody: South Fork of Wildcat Creek, Hog Run, Middle Fork of Wildcat Creek, and Kilmore Creek

E. REVIEW PERFORMED FOR SITE EVALUATION (CHECK ALL THAT APPLY):

Office (Desk) Determination. Date:

Field Determination. Date(s):

TABLE OF AQUATIC RESOURCES IN REVIEW AREA WHICH "MAY BE" SUBJECT TO REGULATORY JURISDICTION.

Site number	Latitude (decimal degrees)	Longitude (decimal degrees)	Estimated amount of aquatic resource in review area (acreage and linear feet, if applicable)	Type of aquatic resource (i.e., wetland vs. non-wetland waters)	Geographic authority to which the aquatic resource "may be" subject (i.e., Section 404 or Section 10/404)
See	Attached	Form			

- 1) The Corps of Engineers believes that there may be jurisdictional aquatic resources in the review area, and the requestor of this PJD is hereby advised of his or her option to request and obtain an approved JD (AJD) for that review area based on an informed decision after having discussed the various types of JDs and their characteristics and circumstances when they may be appropriate.
- 2) In any circumstance where a permit applicant obtains an individual permit, or a Nationwide General Permit (NWP) or other general permit verification requiring "pre-construction notification" (PCN), or requests verification for a non-reporting NWP or other general permit, and the permit applicant has not requested an AJD for the activity, the permit applicant is hereby made aware that: (1) the permit applicant has elected to seek a permit authorization based on a PJD, which does not make an official determination of jurisdictional aquatic resources; (2) the applicant has the option to request an AJD before accepting the terms and conditions of the permit authorization, and that basing a permit authorization on an AJD could possibly result in less compensatory mitigation being required or different special conditions; (3) the applicant has the right to request an individual permit rather than accepting the terms and conditions of the NWP or other general permit authorization; (4) the applicant can accept a permit authorization and thereby agree to comply with all the terms and conditions of that permit, including whatever mitigation requirements the Corps has determined to be necessary; (5) undertaking any activity in reliance upon the subject permit authorization without requesting an AJD constitutes the applicant's acceptance of the use of the PJD; (6) accepting a permit authorization (e.g., signing a proffered individual permit) or undertaking any activity in reliance on any form of Corps permit authorization based on a PJD constitutes agreement that all aquatic resources in the review area affected in any way by that activity will be treated as jurisdictional, and waives any challenge to such jurisdiction in any administrative or judicial compliance or enforcement action, or in any administrative appeal or in any Federal court; and (7) whether the applicant elects to use either an AJD or a PJD, the JD will be processed as soon as practicable. Further, an AJD, a proffered individual permit (and all terms and conditions contained therein), or individual permit denial can be administratively appealed pursuant to 33 C.F.R. Part 331. If, during an administrative appeal, it becomes appropriate to make an official determination whether geographic jurisdiction exists over aquatic resources in the review area, or to provide an official delineation of jurisdictional aquatic resources in the review area, the Corps will provide an AJD to accomplish that result, as soon as is practicable. This PJD finds that there "*may be*" waters of the U.S. and/or that there "*may be*" navigable waters of the U.S. on the subject review area, and identifies all aquatic features in the review area that could be affected by the proposed activity, based on the following information:

SUPPORTING DATA. Data reviewed for PJD (check all that apply)

Checked items should be included in subject file. Appropriately reference sources below where indicated for all checked items:

- Maps, plans, plots or plat submitted by or on behalf of the PJD requestor:
Map: Delineation report dated June 18 and June 20, 2019.
- Data sheets prepared/submitted by or on behalf of the PJD requestor.
 - Office concurs with data sheets/delineation report.
 - Office does not concur with data sheets/delineation report. Rationale: _____.
- Data sheets prepared by the Corps: _____.
- Corps navigable waters' study: _____.
- U.S. Geological Survey Hydrologic Atlas: USGS National Hydrography Dataset, U.S. Geological Survey in cooperation with U. S. Environmental Protection Agency and U.S. Forest Service; I _____.
 - USGS NHD data.
 - USGS 8 and 12 digit HUC maps.
- U.S. Geological Survey map(s). Cite scale & quad name: 24k Lafayette East, Stockwell, Mulberry and Frankfort, IN.
- Natural Resources Conservation Service Soil Survey. Citation: USDA NRCS Soil Survey Geographic (SSURGO) Database for Tippecanoe and Clinton _____.
- National wetlands inventory map(s). Cite name: NWI accessed 2019.
- State/local wetland inventory map(s): _____.
- FEMA/FIRM maps: FEMA accessed 2009 and 2011.
- 100-year Floodplain Elevation is: _____.(National Geodetic Vertical Datum of 1929)
- Photographs: Aerial (Name & Date): ESRI World Imagery, 2017
or Other (Name & Date): Site photos dated: June 18 and 20, 2019.
- Previous determination(s). File no. and date of response letter: _____.
- Other information (please specify): _____.

IMPORTANT NOTE: The information recorded on this form has not necessarily been verified by the Corps and should not be relied upon for later jurisdictional determinations.

Signature and date of
Regulatory staff member
completing PJD

Tamra L. Reece 05/08/2020

Signature and date of
person requesting PJD
(REQUIRED, unless obtaining
the signature is impracticable)¹

¹ Districts may establish timeframes for requestor to return signed PJD forms. If the requestor does not respond within the established time frame, the district may presume concurrence and no additional follow up is necessary prior to finalizing an action.

Feature Designation	Latitude	Longitude	Resource Size (acres/linear feet)	Type of Aquatic Resource	Geographic Authority
South Fork of Wildcat Creek	40.375317	-86.752200	111 ft.	Non-Wetland Waters	Section 404
UNT 1	40.368372	-86.733092	108 ft.	Non-Wetland Waters	Section 404
UNT 2	40.363486	-86.721992	795 ft.	Non-Wetland Waters	Section 404
UNT 3	40.350244	-86.682836	118 ft.	Non-Wetland Waters	Section 404
UNT 4	40.344675	-86.642897	111 ft.	Non-Wetland Waters	Section 404
UNT 5	40.344519	-86.611375	127 ft.	Non-Wetland Waters	Section 404
UNT 6	40.344414	-86.601578	141 ft.	Non-Wetland Waters	Section 404
UNT 7	40.344386	-86.598983	263 ft.	Non-Wetland Waters	Section 404
UNT 8	40.344364	-86.598478	124 ft.	Non-Wetland Waters	Section 404
UNT 9	40.34445	-86.584281	150 ft.	Non-Wetland Waters	Section 404
UNT 10	40.344389	-86.580906	96 ft.	Non-Wetland Waters	Section 404
UNT 11	40.344244	-86.576983	140 ft.	Non-Wetland Waters	Section 404
UNT 12	40.344233	-86.571997	40 ft.	Non-Wetland Waters	Section 404
Wetland C	40.344311	-86.580975	0.007 ac.	Wetland	Section 404

APPENDIX G

Public Involvement

September 29, 2020

NOTICE OF SURVEY

«OwnerName»
«Mailing_Address»
«Mailing_CityStateZip»

RE: **DES #1601074:** State Road 38 HMA overlay from County Road 900 near the Town of Dayton, Tippecanoe County, Indiana to U.S. Highway 421/State Road 39 in Clinton County, Indiana

Dear Property Owner:

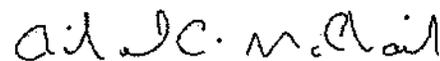
Our information indicates that you own or occupy property near the subject proposed highway project. Our employees will be performing a survey of the project area in the near future. It may be necessary for them to come onto your property to complete this work. This is permitted by law per Indiana Code IC 8-23-7-26. They will show you their identification if you are available, before coming onto your property. If you have sold this property, or it is occupied by someone else, please let us know the name and address of the new owner or current occupant so we can contact them about the survey.

At this stage, we generally do not know what effect, if any, our project can eventually have on your property. If we determine later that your property is involved, we will contact you with additional information.

The survey work will include mapping the location of features such as trees, buildings fences and drives as well as obtaining ground elevations. This survey is needed for the proper planning and design of this highway project. Please be assured of our sincere desire to cause you as little inconvenience as possible during this survey. If problems do occur, please contact our field crew or contact me at the telephone number or address shown above.

Sincerely,

HANSON PROFESSIONAL SERVICES INC.



Richard P. McPhail, PS
Senior Surveyor

APPENDIX H

Air Quality

Indiana Department of Transportation (INDOT)
 State Preservation and Local Initiated Projects FY 2020 - 2024

SPONSOR	CONTR ACT # / LEAD DES	STIP NAME	ROUTE	WORK TYPE	LOCATION	DISTRICT	MILES	FEDERAL CATEGORY	Estimated Cost left to Complete Project*	PROGRAM	PHASE	FEDERAL	MATCH	2020	2021	2022	2023	2024
Clinton County																		
Indiana Department of Transportation	1801465	Init.	US 421	Pavement Replacement, Small Town	From 0.151 mi S of SR 26 to SR 26	Crawfordsville	.17	STPBG		Road Construction	CN	\$706,448.80	\$176,612.20			\$883,061.00		
										Road ROW	RW	\$8,000.00	\$2,000.00	\$10,000.00				
Indiana Department of Transportation	37797 / 1400263	Init.	SR 26	Road Rehabilitation (3 R/4R Standards)	From 0.62 mi E of US 421 to 0.38 mi E of SR 75	Crawfordsville	3.426	NHPP		Road Construction	CN	\$21,403,693.60	\$5,350,923.40	\$26,754,617.00				
										Safety Construction	CN	\$3,227,010.40	\$806,752.60	\$4,033,763.00				
Indiana Department of Transportation	38221 / 1005600	Init.	SR 28	Pavement Replacement	From 1.64 mi W of SR 39 to SR 39 (Jackson St)	Crawfordsville	1.632	STPBG		Bridge Construction	CN	\$273,275.20	\$68,318.80	\$341,594.00				
										Road Construction	CN	\$10,864,148.00	\$2,716,037.00	\$13,580,185.00				
Clinton County	38261 / 1500231	Init.	VA VARI	Bridge Inspections	Countywide Bridge Inspection and Inventory Program for Cycle Years 2018-2021	Crawfordsville	0	Multiple		Local Funds	PE	\$0.00	\$21,555.00	\$17,822.20	\$3,732.80			
										Local Bridge Program	PE	\$86,220.00	\$0.00	\$71,288.80	\$14,931.20			
Indiana Department of Transportation	39763 / 1800465	Init.	SR 26	Bridge Deck Overlay	over M Fork Wildcat Creek; 0.129 mi E of SR 29	Crawfordsville	0	NHPP		Bridge Construction	CN	\$1,305,957.60	\$326,489.40		\$1,632,447.00			
Clinton County	39856 / 1600769	Init.	IR 1026	Bridge Replacement, Other Construction	Bridge # 36 carrying CR 950 W over South Fork Wildcat Creek NON-SELECT	Crawfordsville	.205	STPBG		Local Funds	RW	\$0.00	\$17,000.00	\$17,000.00				
										Local Funds	CN	\$0.00	\$327,980.00			\$327,980.00		
										Local Bridge Program	RW	\$68,000.00	\$0.00	\$68,000.00				
										Local Bridge Program	CN	\$1,311,920.00	\$0.00			\$1,311,920.00		
Indiana Department of Transportation	39956 / 1600874	Init.	US 52	Small Structure Replacement	1.12 mi E of SR 28 S Jct	Crawfordsville	0	STPBG		Bridge Construction	CN	\$1,971,809.60	\$492,952.40		\$2,464,762.00			
Indiana Department of Transportation	40093 / 1601994	Init.	SR 26	Bridge Thin Deck Overlay	Bridge over Campbells Run, 0.72 mi W of US 421	Crawfordsville	0	NHPP		Bridge Construction	CN	\$1,483,688.00	\$370,922.00	\$1,854,610.00				
Indiana Department of Transportation	40106 / 1593047	Init.	SR 28	HMA Overlay, Preventive Maintenance	From US 421 to 8.02 mi E of US 421 (County Line)	Crawfordsville	8.021	STPBG		Road Construction	CN	\$1,901,039.20	\$475,259.80	\$2,376,299.00				
Indiana Department of Transportation	40528 / 1601074	Init.	SR 38	HMA Overlay Minor Structural	from 1.16 mi E of I-65 to US 421	Crawfordsville	10.787	STPBG		Road Construction	CN	\$5,349,035.20	\$1,337,258.80			\$6,686,294.00		
										Road ROW	RW	\$480,000.00	\$120,000.00	\$600,000.00				
Indiana Department of Transportation	40536 / 1500107	Init.	SR 75	Small Structure Replacement	0.80 mi S of SR 26	Crawfordsville	0	STPBG		Bridge Construction	CN	\$650,383.20	\$162,595.80	\$75,000.00		\$737,979.00		

Table 6: Funded Indiana Department of Transportation Projects, continued

	Project Location & Description	Ph	Fund Code	Federal Funds	State Funds	Total Cost	Anticipated Year
26	SR 26, Des # 1800215 At CR 900E New Signal Installation	PE RW CN	STBG STBG	146,260 625,241	36,565 156,310	182,825 781,551	2020 2023
27	SR 26, Des # 1800569 I-65 SB Ramps to 1.49 mi E of I-65, Patch & Rehab, PCCP Pavements	CN	STBG	1,812,956	453,239	2,266,195	2021
28	SR 26, Des # 1802820 At CR 900E, New Signal Installation	CN	STBG	184,000	46,000	230,000	2020
29	SR 26, Des # 1900333 Bridge over Goose Creek New Bridge Construction	PE RW CN	STBG STBG	88,000 3,617,366	22,000 904,342	110,000 4,521,708	2020 2024
30	SR 28, Des # 1500155 SR 25 to US 231, HMA Functional Overlay	CN	STBG	3,495,471	873,868	4,369,339	2020
31	SR 28, Des # 1592968 US 231 to US 52 W Junction Road Rehabilitation	PE RW CN	STBG STBG	554,908 12,291,053	138,727 3,072,763	693,635 15,363,816	2021 2022
32	SR 28, Des # 1602094 0.13 mi W of US 231, Wea Creek, Bridge Thin Deck Overlay	CN	STBG	41,926	10,482	52,408	2020
33	SR 28, Des # 1800670 Over Little Wea Creek, Bridge Deck Overlay	CN	STBG	127,738	31,935	159,673	2021
34	SR 28, Des # 1801298 Over Haywood Ditch, Bridge Deck Overlay	CN	STBG	310,093	77,523	387,616	2020
35	SR 38, Des # 1601073 Within the Town Limits of Dayton Road Rehabilitation	PE RW CN	STBG STBG	40,000 1,055,957	10,000 263,989	50,000 1,319,946	2020 2021
36	SR 38, Des # 1601074 1.07 mi E of I-65 to US 421, HMA Overlay	CN	STBG	5,341,035	1,335,259	6,676,294	2022
37	SR 38, Des # 1601997 1.37 mi W of I-65, N&S RR, EB,	CN	STBG	133,075	33,269	166,344	2020
38	SR 38, Des # 1602057 1.37 mi W of I-65, N&S RR, WB,	CN	STBG	135,760	33,940	169,700	2020
39	SR 38, Des # 1701561 WB bridge over Elliott Ditch, Bridge Deck Overlay	CN	STBG	264,047	66,012	330,059	2020

APPENDIX I

Additional Studies

LWCF Project List for Tippecanoe County, Indiana – retrieved from <https://www.lwcfcoalition.com/tools> on 08/24/20

objectid	State	County	Grant ID Element	Type	Grant Element Title	Grant Sponsor	Fiscal Year	Amount
47457	Indiana	TIPPECANOE	279	C	HANNA PARK	LAFAYETTE PARK BOARD	1977	141500
47690	Indiana	TIPPECANOE	506	C	D/CELERY BOG-PHASE II	WEST LAFAYETTE PARK BOARD	1995	75000
51319	Indiana	TIPPECANOE	121	C	RIVERFRONT PARK - I	WEST LAFAYETTE PARK BOARD	1972	70000
51347	Indiana	TIPPECANOE	256	C	TOMMY JOHNSTON PK	WEST LAFAYETTE PARK BOARD	1976	80625
51354	Indiana	TIPPECANOE	275	C	D/TIPPECANOE BATTLEFIELD ACQ	TIPPECANOE COUNTY PARK BOARD	1977	195382.1
51374	Indiana	TIPPECANOE	345	A	GLEN ACRES PARK ACQUISITION	LAFAYETTE PARK BOARD	1979	142125.3
60668	Indiana	TIPPECANOE	28	D	TIPPECANOE COUNTY FAIRGROUNDS	TIPPECANOE COUNTY PARK BOARD	1968	3351.28
60695	Indiana	TIPPECANOE	155	A	HAPPY HOLLOW PARK ACQ.	WEST LAFAYETTE PARK BOARD	1973	23500
60792	Indiana	TIPPECANOE	494	C	CELERY BOG	WEST LAFAYETTE PARK BOARD	1993	75000
60795	Indiana	TIPPECANOE	517	C	D/CELERY BOG-PH IV-LILLY NATURE CENTER	WEST LAFAYETTE PARK BOARD	2000	200000
78887	Indiana	TIPPECANOE	101	A	WABASH RIVER PARK ACQ	LAFAYETTE PARK BOARD	1972	276675
78889	Indiana	TIPPECANOE	115	D	WABASH RIVER GOLF COURSE	LAFAYETTE PARK BOARD	1972	389250
78986	Indiana	TIPPECANOE	515	C	CELERY BOG - PHASE III	WEST LAFAYETTE PARK BOARD	1997	63918.75
78991	Indiana	Tippecanoe	532	A	PROPHETSTOWN STATE PARK ACQUISITION	DEPT. OF NATURAL RESOURCES	2002	2627993

State LWCF by County list for Clinton County, Indiana - retrieved from <https://www.lwcfcoalition.com/tools> on 08/24/20

OBJECTID	Name	State	Total LWCF Dollars	Total Projects	per_capita	pop_est
3024	CLINTON	INDIANA	0	0	0	33086

Figure 1. Analysis of Affected Community (AC) and Community of Comparison (COC)

	COC 1	COC 2	COC 1&2 (Combined)	AC1	AC2	AC 1&2 (Combined)
	<u>Clinton County, Indiana</u>	<u>Tippecanoe County, Indiana</u>	<u>Clinton and Tippecanoe Counties, Indiana</u>	<u>Census Tract 9503, Clinton County, Indiana</u>	<u>Census Tract 109.02, Tippecanoe, Indiana</u>	<u>Census Tracts 9503, Clinton County, Indiana Census Tract 109.02, Tippecanoe County, Indiana</u>
LOW-INCOME						
Population for whom poverty status is determined:						
Total	32,357	153,488	185,845	4,698	3,705	8,403
Population for whom poverty status is determined:						
Income in past 12 months below poverty level	3,797	30,660	34,457	454	256	710
Percent Low-income	11.70%	20%	18.50%	9.66%	6.90%	8.44%
125 Percent of COC			23.17%			AC<125% COC
Potential Low-Income EJ Impact?						No
MINORITY						
Total Population: Total	33,270	168,635	201,905	4,929	3,718	8,647
Total Population: Not hispanic or latino	29,181	156,588	185,769	4,849	3,647	8,496
Total Population: Not hispanic or latino; White alone	28,679	137,112	165,791	4,726	3,609	8,335
Total Population: Not hispanic or latino; Black or African American alone	174	6,049	6,223	45	13	58
Total Population: Not hispanic or latino; American Indian and Alaskan Native alone	80	280	360	21	0	21
Total Population: Not hispanic or latino; Asian alone	15	10,317	10,332	0	0	0
Total Population: Not hispanic or latino; Native Hawaiian and Other Pacific Islander alone	0	65	65	0	0	0
Total Population: Not hispanic or latino; Some other race alone	8	156	164	0	0	0
Total Population: Not hispanic or latino; Two or more races	0	28	28	0	0	0
Total Population: Hispanic or latino	4,089	12,047	16,136	80	71	151

Total Population: Hispanic or latino; White alone	2,590	7,908	10,498	6	17	23
Total Population: Hispanic or latino; Black or African American alone	0	352	352	0	0	0
Total Population: Hispanic or latino; American Indian and Alaskan Native alone	63	67	197	0	0	0
Total Population: Hispanic or latino; Asian alone	0	1	1	0	0	0
Total Population: Hispanic or latino; Native Hawaiian and Other Pacific Islander alone	0	0	0	0	0	0
Total Population: Hispanic or latino; Some other race alone	1,255	3,014	4,269	35	54	89
Total Population: Hispanic or latino; Two or more races	181	705	886	39	0	39
Number Non-white/minority	4,591	31,523	36,114	203	109	312
Percent Non-white/minority	13.70%	18.69%	17.88%	4.11%	2.93%	3.60%
125 Percent of COC			22.35%			AC<125% COC
Potential Minority EJ Impact?						No



B03002

HISPANIC OR LATINO ORIGIN BY RACE
Universe: Total population
2006-2010 American Community Survey 5-Year Estimates

Supporting documentation on code lists, subject definitions, data accuracy, and statistical testing can be found on the American Community Survey website in the Data and Documentation section.

Sample size and data quality measures (including coverage rates, allocation rates, and response rates) can be found on the American Community Survey website in the Methodology section.

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	Clinton County, Indiana		Tippecanoe County, Indiana		Census Tract 9503, Clinton County, Indiana	
	Estimate	Margin of Error	Estimate	Margin of Error	Estimate	Margin of Error
Total:	33,270	*****	168,635	*****	4,929	+/-224
Not Hispanic or Latino:	29,181	*****	156,588	*****	4,849	+/-235
White alone	28,679	+/-12	137,112	+/-62	4,726	+/-266
Black or African American alone	174	+/-73	6,049	+/-282	45	+/-48
American Indian and Alaska Native alone	80	+/-40	280	+/-130	21	+/-20
Asian alone	15	+/-16	10,317	+/-243	0	+/-119
Native Hawaiian and Other Pacific Islander alone	0	+/-119	65	+/-61	0	+/-119
Some other race alone	8	+/-12	156	+/-104	0	+/-119
Two or more races:	225	+/-81	2,609	+/-391	57	+/-43
Two races including Some other race	0	+/-119	28	+/-28	0	+/-119
Two races excluding Some other race, and three or more races	225	+/-81	2,581	+/-389	57	+/-43
Hispanic or Latino:	4,089	*****	12,047	*****	80	+/-73
White alone	2,590	+/-349	7,908	+/-616	6	+/-7
Black or African American alone	0	+/-119	352	+/-303	0	+/-119
American Indian and Alaska Native alone	63	+/-105	67	+/-69	0	+/-119
Asian alone	0	+/-119	1	+/-119	0	+/-119
Native Hawaiian and Other Pacific Islander alone	0	+/-119	0	+/-119	0	+/-119
Some other race alone	1,255	+/-368	3,014	+/-582	35	+/-58
Two or more races:	181	+/-100	705	+/-195	39	+/-47

	Clinton County, Indiana		Tippecanoe County, Indiana		Census Tract 9503, Clinton County, Indiana	
	Estimate	Margin of Error	Estimate	Margin of Error	Estimate	Margin of Error
Two races including Some other race	146	+/-104	455	+/-159	39	+/-47
Two races excluding Some other race, and three or more races	35	+/-42	250	+/-112	0	+/-119

	Census Tract 109.02, Tippecanoe County, Indiana	
	Estimate	Margin of Error
Total:	3,718	+/-17
Not Hispanic or Latino:	3,647	+/-89
White alone	3,609	+/-115
Black or African American alone	13	+/-20
American Indian and Alaska Native alone	0	+/-119
Asian alone	0	+/-119
Native Hawaiian and Other Pacific Islander alone	0	+/-119
Some other race alone	0	+/-119
Two or more races:	25	+/-34
Two races including Some other race	0	+/-119
Two races excluding Some other race, and three or more races	25	+/-34
Hispanic or Latino:	71	+/-88
White alone	17	+/-17
Black or African American alone	0	+/-119
American Indian and Alaska Native alone	0	+/-119
Asian alone	0	+/-119
Native Hawaiian and Other Pacific Islander alone	0	+/-119
Some other race alone	54	+/-81
Two or more races:	0	+/-119
Two races including Some other race	0	+/-119
Two races excluding Some other race, and three or more races	0	+/-119

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Source: U.S. Census Bureau, 2006-2010 American Community Survey

Explanation of Symbols:

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B17001

POVERTY STATUS IN THE PAST 12 MONTHS BY SEX BY AGE

Universe: Population for whom poverty status is determined
2006-2010 American Community Survey 5-Year Estimates

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	Clinton County, Indiana		Tippecanoe County, Indiana		Census Tract 9503, Clinton County, Indiana
	Estimate	Margin of Error	Estimate	Margin of Error	Estimate
Total:	32,357	+/-231	153,488	+/-1,281	4,698
Income in the past 12 months below poverty level:	3,797	+/-592	30,660	+/-1,614	454
Male:	1,662	+/-339	15,319	+/-1,086	208
Under 5 years	284	+/-112	1,367	+/-279	30
5 years	30	+/-27	291	+/-102	10
6 to 11 years	287	+/-101	877	+/-161	0
12 to 14 years	84	+/-43	475	+/-143	13
15 years	29	+/-29	117	+/-102	0
16 and 17 years	55	+/-35	94	+/-64	20
18 to 24 years	205	+/-70	8,870	+/-897	58
25 to 34 years	201	+/-90	1,311	+/-235	21
35 to 44 years	183	+/-81	946	+/-238	22
45 to 54 years	219	+/-121	528	+/-164	8
55 to 64 years	16	+/-16	279	+/-107	8
65 to 74 years	51	+/-36	117	+/-72	0
75 years and over	18	+/-15	47	+/-39	18
Female:	2,135	+/-344	15,341	+/-1,062	246
Under 5 years	229	+/-76	1,019	+/-159	35
5 years	90	+/-69	191	+/-110	15
6 to 11 years	222	+/-98	866	+/-190	21
12 to 14 years	77	+/-51	455	+/-153	10
15 years	19	+/-21	201	+/-92	0
16 and 17 years	83	+/-55	307	+/-121	10
18 to 24 years	215	+/-75	7,169	+/-713	16
25 to 34 years	402	+/-123	2,038	+/-280	47
35 to 44 years	228	+/-90	1,049	+/-202	44
45 to 54 years	174	+/-67	948	+/-253	22
55 to 64 years	188	+/-79	509	+/-140	0
65 to 74 years	75	+/-42	250	+/-92	15
75 years and over	133	+/-59	339	+/-98	11
Income in the past 12 months at or above poverty level:	28,560	+/-597	122,828	+/-1,485	4,244
Male:	14,155	+/-350	62,567	+/-956	2,142

	Clinton County, Indiana		Tippecanoe County, Indiana		Census Tract 9503, Clinton County, Indiana
	Estimate	Margin of Error	Estimate	Margin of Error	Estimate
Under 5 years	1,010	+/-112	4,007	+/-281	191
5 years	214	+/-100	868	+/-185	2
6 to 11 years	1,201	+/-134	4,608	+/-304	109
12 to 14 years	617	+/-125	2,006	+/-213	86
15 years	166	+/-69	957	+/-166	57
16 and 17 years	468	+/-77	1,783	+/-164	81
18 to 24 years	1,134	+/-100	7,401	+/-773	120
25 to 34 years	1,673	+/-112	10,926	+/-244	269
35 to 44 years	1,969	+/-107	8,473	+/-243	296
45 to 54 years	2,173	+/-112	8,640	+/-217	399
55 to 64 years	1,772	+/-52	6,700	+/-127	217
65 to 74 years	957	+/-45	3,562	+/-105	173
75 years and over	801	+/-33	2,636	+/-67	142
Female:	14,405	+/-340	60,261	+/-1,089	2,102
Under 5 years	917	+/-87	4,138	+/-169	120
5 years	307	+/-115	869	+/-211	48
6 to 11 years	1,113	+/-152	4,168	+/-331	130
12 to 14 years	597	+/-114	2,345	+/-268	95
15 years	225	+/-76	571	+/-144	30
16 and 17 years	460	+/-93	1,816	+/-164	91
18 to 24 years	1,134	+/-84	5,533	+/-642	123
25 to 34 years	1,573	+/-128	9,097	+/-284	197
35 to 44 years	1,899	+/-100	8,096	+/-225	297
45 to 54 years	2,202	+/-83	8,491	+/-291	370
55 to 64 years	1,673	+/-92	7,160	+/-153	225
65 to 74 years	1,142	+/-45	4,108	+/-117	153
75 years and over	1,163	+/-102	3,869	+/-160	223

	Census Tract 9503, Clinton County, Indiana	Census Tract 109.02, Tippecanoe County, Indiana	
	Margin of Error	Estimate	Margin of Error
Total:	+/-194	3,705	+/-26
Income in the past 12 months below poverty level:	+/-160	256	+/-158
Male:	+/-83	145	+/-114
Under 5 years	+/-42	42	+/-41
5 years	+/-16	7	+/-12
6 to 11 years	+/-119	57	+/-54
12 to 14 years	+/-20	2	+/-5
15 years	+/-119	0	+/-119
16 and 17 years	+/-22	0	+/-119
18 to 24 years	+/-43	0	+/-119
25 to 34 years	+/-18	16	+/-20
35 to 44 years	+/-29	3	+/-4
45 to 54 years	+/-12	18	+/-17
55 to 64 years	+/-13	0	+/-119
65 to 74 years	+/-119	0	+/-119
75 years and over	+/-15	0	+/-119
Female:	+/-95	111	+/-59
Under 5 years	+/-28	10	+/-12
5 years	+/-18	0	+/-119
6 to 11 years	+/-16	0	+/-119
12 to 14 years	+/-16	3	+/-5
15 years	+/-119	0	+/-119
16 and 17 years	+/-15	0	+/-119
18 to 24 years	+/-14	26	+/-35
25 to 34 years	+/-27	38	+/-31
35 to 44 years	+/-50	20	+/-20
45 to 54 years	+/-17	0	+/-119
55 to 64 years	+/-119	3	+/-7
65 to 74 years	+/-13	2	+/-5
75 years and over	+/-9	9	+/-11
Income in the past 12 months at or above poverty level:	+/-267	3,449	+/-161
Male:	+/-176	1,670	+/-110
Under 5 years	+/-81	87	+/-43
5 years	+/-4	22	+/-21
6 to 11 years	+/-37	156	+/-72
12 to 14 years	+/-44	96	+/-43
15 years	+/-36	56	+/-38
16 and 17 years	+/-36	77	+/-49
18 to 24 years	+/-48	112	+/-63
25 to 34 years	+/-94	184	+/-58
35 to 44 years	+/-64	232	+/-64
45 to 54 years	+/-77	278	+/-52
55 to 64 years	+/-55	196	+/-50
65 to 74 years	+/-45	54	+/-31
75 years and over	+/-42	120	+/-32
Female:	+/-180	1,779	+/-127
Under 5 years	+/-43	78	+/-39
5 years	+/-29	27	+/-25
6 to 11 years	+/-55	188	+/-67
12 to 14 years	+/-38	111	+/-56
15 years	+/-21	29	+/-29
16 and 17 years	+/-42	54	+/-35
18 to 24 years	+/-46	58	+/-33
25 to 34 years	+/-57	282	+/-69
35 to 44 years	+/-62	307	+/-68
45 to 54 years	+/-73	307	+/-61
55 to 64 years	+/-67	162	+/-54
65 to 74 years	+/-44	79	+/-37

	Census Tract 9503, Clinton County, Indiana	Census Tract 109.02, Tippecanoe County, Indiana	
	Margin of Error	Estimate	Margin of Error
75 years and over	+/-58	97	+/-39

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Legend:

Your Selections

- 2017 boundaries were used to map 'Your Selections'

Selection Results

No Legend

2017 Boundaries

- Census Tract

